

**A STUDY TO ASSESS THE EFFECTIVENESS OF
VIDEO TEACHING PROGRAMME ON
KNOWLEDGE AND PRACTICE REGARDING
CONTROL AND PREVENTION OF DENGUE
FEVER AMONG HOUSEWIFE IN SELECTED
RURAL AREA AT NAMAKKAL DISTRICT**



*A Dissertation submitted to
The TamilnaduDr.M.G.R. Medical University, Chennai - 32
in partial fulfillment of the requirement for the degree of*

MASTER OF SCIENCE IN NURSING

By

Reg. No: 301227451

COMMUNITY HEALTH NURSING

**SRESAKTHIMAYEIL INSTITUTE OF NURSING AND
RESEARCH**

(JKK Nattraja Educational Institutions)

KUMARAPALAYAM

OCTOBER - 2014

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APPROVED BY DISSERTATION COMMITTEE

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A DISSERTATION SUBMITTED IN PARTIAL FULFILLMENT OF
THE REQUIREMENT FOR THE DEGREE OF MASTER OF SCIENCE IN
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EXAMINERS

1.

2.

OCT – 2014

DECLARATION

301227451, hereby declare that this dissertation entitled **“A Study to assess the Effectiveness of Video Teaching Programme on Knowledge and Practice regarding Control and Prevention of Dengue Fever Among Housewife in Selected Rural Area At Namakkal District”** has been prepared by me under the guidance and direct supervision of **Mrs..R.Jamunarani, M.Phil(N)., Ph.D., Professor cum Principal,** and **Mrs.M.Arockiamary, M.Sc(N)., Reader,** Department of Community Health Nursing, sresakthimayeil institute of nursing and research (JKK Nattraja Educational Institutions), Kumarapalayam as the requirement for partial fulfillment of **MASTER OF SCIENCE IN NURSING** degree under **The TamilNadu Dr. M.G.R. Medical University, Chennai-32.** This dissertation had not been previously formed and this will not be used in further for award of any other degree/diploma. This dissertation represents independent work on the part of the candidate.

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“Everyone has a potential, you just have to discuss it”

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“Above all, the investigators owe this success to Almighty.”

RESEARCH ABSTRACT

Background: We are familiar with the following statements: "Mosquitoes are worse than Tigers" and It's very difficult to control Dengue fever until it subside dengue fever has been main health problem of the world. This study assess the effectiveness of video teaching programme on knowledge and practice regarding control and prevention of Dengue fever among Housewife in selected rural area at Namakkal district. **OBJECTIVES:** 1) To assess the pre test knowledge and practice regarding control and prevention of Dengue fever, 2) to deliver the video teaching programme regarding control and prevention of Dengue fever, 3) to assess the post test knowledge and practice regarding control and prevention of Dengue fever, 4) to evaluate the effectiveness of video teaching programme on knowledge and practice regarding control and prevention of Dengue fever. 5) to find out the correlation between the knowledge and practice regarding control and prevention of Dengue fever, 6) to find out the association between post test scores of knowledge and practice with demographic variables. **METHOLOGY:** The study was conducted in olapalayam rural community, Namakkal district. The research design used for this study was Quasi- experimental (one group pre test post test). 50 samples were selected through convenience sampling technique. A structured interview schedule and observational check list was used to collect the data on knowledge and practice regarding control and prevention of Dengue fever among Housewives for pre test followed by that video teaching programme on control and prevention of Dengue fever has been given. Post test was conducted after an interval of one week by using the same questionnaire and observational check list. The data was analyzed by using descriptive and inferential statistics. **FINIDINGS:** The demographic variables associated on the basis of knowledge are age (8.73>7.82) Educational status (9.52>7.82), Income (8.08>7.82), Source of information (10.72>7.82), Type of solid waste disposal (8.39>7.82) and the demographic variables associated on the basis of practice are income (11.48>7.82), Source of information (11.0>7.82), type of solid waste disposal (8.76>7.82) on control and prevention of Dengue fever. Pretest knowledge level was assessed among Housewife, mean was 12.14, standard deviation 3.4 and the overall knowledge of mean percentage was 40% that shows the Housewives were in inadequate knowledge. Pretest level of practice score was

inadequate, mean was 9.8, standard deviation was 2.6. The overall practice mean percentage was 49% Post test knowledge score in mean 19.9 and standard deviation 2.81. The overall knowledge of mean percentage was 66% that shows adequate knowledge after video teaching programme., Post test practice score in mean 16.3 and standard deviation 2.0. The overall practice mean percentage was 82% that shows adequate practice after video teaching programme., Area wise calculation of knowledge level was assessed. The post test mean percentage for definition of Dengue fever 73%, causes of Dengue fever was 63%, mode of transmission of Dengue fever was 65%, signs & symptoms of Dengue fever was 65%, complication of Dengue fever was 48%, and prevention of Dengue fever was 70%. Comparison of pre and post test level of knowledge was analyzed by using paired 't' test. Calculated 't' value was 14.8 ($14.8 > 2.02$) which was greater than table value. So it was significant at $p > 0.05$ level. Comparison of pre and post test level of knowledge in area wise also analyzed by using paired 't' test. Calculated 't' value for definition of Dengue fever $7.7 > 2.02$, causes $14.6 > 2.02$, mode of transmission $9.8 > 2.02$, signs & symptoms $8.6 > 2.02$, complication $4.0 > 2.02$ and prevention of Dengue fever $6.0 > 2.02$. Hence all the areas of knowledge were greater than the table value. So it was significant at $p > 0.05$ level. Comparison of pre and post test level of practice was analyzed by using paired t test. Calculated 't' value was 16.2 ($16.2 > 2.02$) which was greater than table value. So it was significant at $p > 0.05$ level. Correlation between knowledge and practice was done by using Karl Pearson's correlation method. The calculated 'r' value was 0.62 ($0.62 > 0.28$). The calculated 'r' value was higher than the table value. Hence it was a positive correlation between knowledge and practice so knowledge of the disease reported a significant higher use of preventive measures on control and prevention of Dengue fever. **Conclusion:** The study proves that video teaching programme on control and prevention of dengue fever among Housewife was effective in improving the knowledge and practice.

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CHAPTER I

INTRODUCTION

“SMALL BITE BIG THREAT”

WHO Theme (2014)

Communicable diseases have affected human life even since earlier times and continue to be major health problems. Dengue is the most common one when compared to all the arthod-borne viral diseases.

Dengue fever is an acute, infectious, commonest arboviral disease, caused by dengue viruses, transmitted from person to person, by the bite of infective, female, *Aedes mosquito*.

Dengue virus is a member of Flavi-virus group, belongs to Castle's group Band family Togaviridae. It is RNA virus, spherical, 17 to 25 millimicrons in diameter. Serologically there are 4 types, DEN-1, DEN-2, and DEN-3 and DEN-4. The most efficient vector is *Aedes aegypti* mosquito. It is most efficient because of its peridomestic habit, i.e., it breeds near human habitations, in the water, collected in artificial containers like coconut shell, broken pot and bottle, flower vase, air coolers, etc. It is a black mosquito with white bands. So it is called as “Tiger mosquito”.

During the last 6 months of the year 2014, 20074 suspected dengue cases have been reported to the epidemiology unit from all over the island. High level of dengue activity is being observed in a number of Pacific island countries and areas (PICs). Dengue virus serotype 2 (DENV-2) has recently been isolated in Tuvalu in spite of DENV-3 being the current predominant strain. In 2013 DENV-3 re-emerged in several countries and territories in the South Pacific after nearly 20 years. WHO is closely monitoring the situation in the Region, especially with regard to serotype

circulation. In French Polynesia the total number of positive cases of dengue reported since February 2013 is 2,188. In the Solomon Islands, the total number of cases have been reported since January 2014 is 1513. In Cook Islands, the total number of suspected cases since the beginning of the outbreak (13 Feb 2014) is 932.

(WHO 2013)

There has been a rise in dengue cases in India. As per the data available, the number of cases and deaths due to dengue fever in India were higher in 2012 as compared to 2011. The statistics further revealed that 49,606 dengue cases were detected across India and 247 died of the deadly fever in 2012. **(National Trunk News Feb 2013)**

Tamilnadu has recorded the most number of dengue cases in the country after Maharashtra between January 1 and June 30, 2014. Statistics from the National Vector Borne Disease Control Programme (NVBDCP) shows that, the state recorded 677 cases after Maharashtra (963), and was followed by Kerala (651), Karnataka (528), and Gujarat (220). Across the country, 3,763 cases and 2 deaths were reported in this period. In Chennai, corporation sources say, more than 100 cases of dengue have been reported so far this year, most of them from Adyar, Kodambakkam and Alandur Zones. **(The times of India, June 2014)**

A total of 26 cases have been recorded in Namakkal District in 2012 and 47 cases have been reported in Feb 2013. Special teams have been formed in all the 15 Blocks of the District to closely monitor dengue cases. **(The Hindu Oct 2012)**

The increase of dengue and dengue hemorrhagic fever is due to uncontrolled population and urbanization without appropriate water management, to the global spread of dengue via travel and trade and erosion of vector control programme.

Dengue fever is an emerging public health problem in India. So special attention is required to be paid for its prevention and control.

NEED FOR STUDY

Over the past 10-15 years, next to diarrheal disease and acute respiratory infections, dengue has become a leading cause of hospitalization and death among children. In India, epidemics are becoming more frequent. If untreated mortality from complication of dengue fever is as high as 20% whereas if recognized early & managed properly, mortality is less than 1%. **(K.Park- 2011)**

The Hindu (October 09, 2012) reports that the Salem Corporation has initiated several measures to control the mosquito menace in the city. The civic body has deputed 120 personnel to carryout mosquito control activities. Spraying of repellents, fogging and cleaning of drainage channels and anti-larval measures were being carried. The sanitary workers covered 10 wards in a day and achieved 60-75 percent source reduction and control through anti-larval measures and also educated people about sanitation and mosquito control measures.

The outbreak of dengue fever that infected some of 20 people in Florida's martin country last year unnerved many who feared the tropical disease had once again established a foothold in Florida. The last outbreak occurred in 2009 and 2010. Before that, the disease hadn't struck Florida in more than 70 years. Now scientists from the Florida campus of the Scripps Research Institute (TSRT) have been awarded \$2.3 million from the National Institute of Health to study a category of viruses that causes dengue fever. **(Jupiter, FL- march, 2014)**

Innovative research has provided the first clues towards creating an anti viral therapy for dengue fever, which affects 390 million people each year worldwide. There are currently no vaccines (or) anti viral treatments which can

safely (or) effectively control the diseases. However, researchers from the University of Bristol have shown that there could be significant difference between the four types of dengue viruses cause the disease, one protein in particular –NS5- is essential for the virus to spread. This is important as it impacts on our understanding of viral replication and pathogenesis. The design of anti viral therapies those are effective against all (dengue fever) types.

(Andrew Davidson,Aug 2013).

Usually in areas, having high population density, poor sanitation and large numbers of desert coolers, overhead tanks, discarded buckets, types, utensils, etc. which promote mosquito breeding are at high risk. It can also occur in rural areas where the environment is friendly for mosquito breeding. Mosquito breeding can occur in containers used for spring water, for cattle feeding and drinking, discarded items which is not cleared periodically.

Due to lack of water facility the people are store water in cement tanks, plastic drums, buckets, cisterns, etc. for household purposes. If these containers are not properly maintained it is an ideal places for Aedes mosquito breeding. Most of the people stored for longer period without proper lid. People have poor knowledge about dengue fever and Aedes aegypti because it is a differ from other mosquitoes. They adapted various preventive measures to escape from mosquito bites only during the night but Aedes mosquito will bite only in day time So health awareness programmes need to be conducted in these areas, especially to housewives who is maintaining sanitation in and around the house and more responsibility for household activities.

(Ramani Bai.R, etal., (2011)

The secret of national health lies in the homes of the people and in the hands of women (housewives). The women would be the suitable group to assess the

knowledge and practice regarding prevention of dengue fever because they are in process of forming habits, easily influenced and primary care providers. They should essentially have the knowledge of preventive measures, so that they can protect their family.

Community participation and ownership prevention programme require extensive health education and community outreach. Since women are the primary care providers, in rural they are more ignorant about causes, occurrences and complications of dengue fever. In every community, there exist varying practices, customs and technology has brought about advancing of life situations still a good number of families are unaware of it. So, community about dengue fever by assessing the existing knowledge and practices of women and there by prevention its occurrence. If the women have the adequate knowledge about prevention of dengue fever, they can play an important role in changing the cause of the epidemics.

Salem health zone which comprises Salem, Namakkal, Dharmapuri and Krishnagiri districts reported 6 positive cases of dengue with no mortality-June 28, 2013. The government medical college hospital in its special ward treated with dengue symptoms from Namakkal, Salem. It is necessary to educate the public schools, and the college students about the preventive measures against the disease.

The Hindu, (June28, 2012).

Olapalayam people are having inadequate knowledge about mosquito control measures and dengue fever. This motivated me to conduct research study on control and prevention of dengue fever among Housewife, because they are the care takers of the family members.

STATEMENT OF THE PROBLEM

A study to assess the effectiveness of video teaching programme on knowledge and practice regarding control and prevention of Dengue fever among Housewives in selected rural area at Namakkal district.

OBJECTIVES:

- ❖ To assess the pre test knowledge and practice regarding control and prevention of Dengue fever
- ❖ To deliver the video teaching programme regarding control and prevention of Dengue fever.
- ❖ To assess the post test knowledge and practice regarding control and prevention of Dengue fever
- ❖ To evaluate the effectiveness of video teaching programme on knowledge and practice regarding control and prevention of Dengue fever.
- ❖ To find out the correlation between the knowledge and practice regarding control and prevention of Dengue fever
- ❖ To find out the association between post test scores of knowledge and practice with demographic variables.

OPERATIONAL DEFINITIONS:

ASSESS:

Refers to the process used to identify the level of knowledge, attitude and practice of Housewives regarding control and prevention of Dengue fever.

EFFECTIVENESS:

It refers to the significant difference between pre and post test knowledge, attitude and practice regarding control and prevention of Dengue fever.

VIDEO TEACHING PROGRAMME:

It is a series of visual information given through slides shows and video's regarding control and prevention of Dengue fever.

KNOWLEDGE:

It refers to the level of information is known by the samples on control and prevention of Dengue fever which was assessed by structured interview questionnaire.

PRACTICE:

It refers to the observations made regarding activities related to control and prevention of Dengue fever as measured by the observational checklist.

PREVENTION:

It refers to the measures to be taken at primary, secondary and tertiary level of Dengue fever.

DENGUE FEVER:

It is an acutely infectious mosquito borne viral disease transmitted through Aedes mosquito.

HOUSEWIFE:

It refers to the married women who will stay in home and is responsible member of the family.

ASSUMPTION:

- Housewife will have some knowledge regarding Dengue fever.
- Housewife will have interest to learn and participate in video teaching programme on control and prevention of Dengue fever.

- The knowledge and practice of Housewives will vary with demographic variables.

HYPOTHESIS:

H1: The mean post test knowledge score is higher than the mean pre test knowledge score on control and prevention of Dengue fever among Housewives.

H2: The mean post test practice score is higher than the mean pre test practice score on control and prevention of Dengue fever among Housewives.

H3: There is a correlation between knowledge and practice score on Control and prevention of Dengue fever among Housewives.

ETHICAL CONSIDERATIONS:

Formal oral permission was obtained from the panchayat leaders and the informed written consent was obtained from Housewives after explaining the purpose of the study. All the information was kept confidential and privacy was provided during the time of data collection.

DELIMITATION:

- ❖ The study is limited to the Housewives who are residing in Olapalayam area at Namakkal district.
- ❖ This study is limited only to 50 samples.
- ❖ Period of study is limited to Housewives who are available at the period of study.
- ❖ The study is limited only to the sample who can speak Tamil.

CONCEPTUAL FRAME WORK:

The conceptual frame work of this study is based on Rosenstock's Health Belief model (1974). Health belief model provides a way of understanding and predicting how clients behave in relation to the health and how they will comply with health care therapies. The model consider the individual's perception of susceptibility to an illness, his perception of the seriousness of the illness, psychosocial and demographic modifying factors and the likelihood that he will take recommended actions. He first perceives the susceptibility of specific illness. Second component is the individual's perception of seriousness of the illness. Modifying factors, the third component influences this perception. The fourth component, the likelihood action that a person will take preventive action involves the person's perceptions of the benefits of taking action.

The health belief model address the relationship between a person's believes on health disease and how he acts. Nurses using this approach can better understand factors that influence one's perceptions and beliefs and the individual's behaviors, in order to plan care that will most effectively assist individual in , maintaining health and preventive illness (Potter & Perry, 2007)

Polit and Hungler (1999) describes that a conceptual frame work deals with abstractions that are assembled by the virtue of their relevance to a common theme. Conceptualization is a process of forming ideas that is utilized and forms conceptual

frame work for development of research design. It helps the researcher to know what data need to be collected and gives direction to an entire research study.

APPLICATION OF THIS CONCEPTUAL FRAME WORK TO THE STUDY:

The model describes about 3 variables:-

HOUSEWIVE'S PERCEPTION:

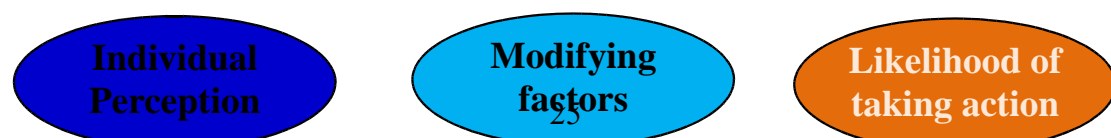
Housewife's perceived knowledge regarding Dengue fever – its meaning, causes, mode of transmission, signs and symptoms, treatment and prevention of Dengue fever and their practices related to prevention of Dengue fever.

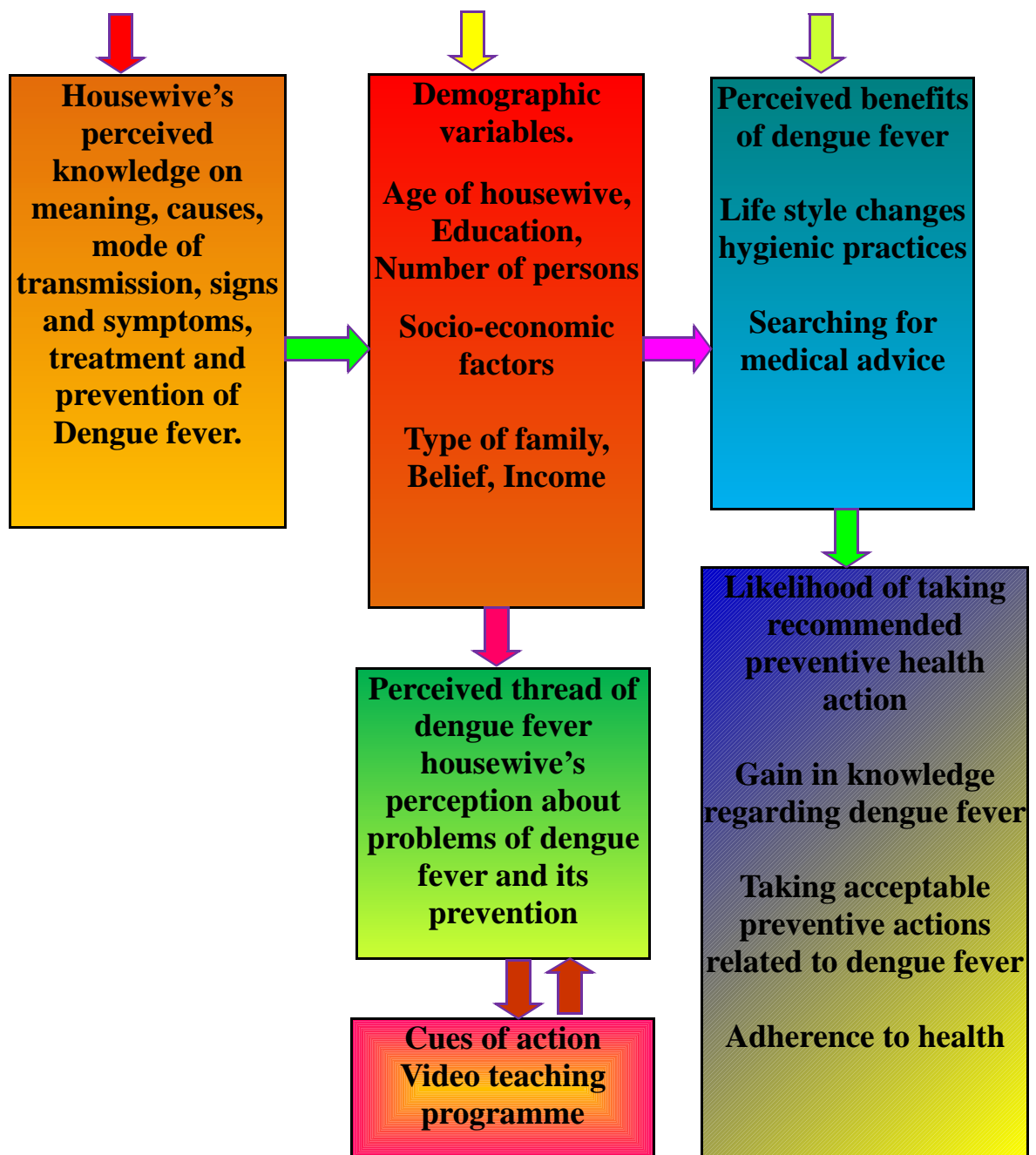
MODIFYING FACTOR:

The Housewife's perception is influenced by cues to action like video teaching programme and health information from health personnel. The Housewife's perception is also influenced by demographic variables like Education, family, income and structured variables like knowledge and practice regarding control and prevention of Dengue fever.

LIKELIHOOD OF TAKING ACTION:

This part indicates Housewife's may try to take action to gain knowledge and initiating measures to prevent Dengue fever.





**Fig. 1 SHOW'S THE CONCEPTUAL FRAME WORK BASED ON
IRWIN ROSEN STOCK'S HEALTH BELIEF MODEL**

REVIEW OF LITERATURE

A review of literature on the research topic makes the researcher familiar with the existing studies and provides information which helps to focus on studies & provides information that helps to focus on a particular problem lay a foundation upon which to base new Knowledge. (Polit and Hungler 2000).

Review of literature for the present study has been organized under the following sections:

- Section I** : Literature review related to prevalence and causes of Dengue fever.
- Section II** : Literature review related to signs and symptoms of Dengue fever.
- Section III** : Literature review related to prevention of Dengue fever.
- Section IV** : Literature review related to knowledge and practice of Dengue fever.

Section I: - Review related to prevalence and causes of Dengue fever.

Ayyup m. khazindar, etal(2006), A study stated that, the aim to determine the demographic, clinical and laboratory profile along with disease outcome of all confirmed cases of dengue fever and dengue hemorrhagic fever admitted in King Abdulaziz Hospital and Oncology centre, SaudiArabia. A total of 80 patients were admitted with a suspected diagnosis of dengue fever. Among these, 39(48.75%) cases were confirmed. The male to female ratio was 3.3:1.Their ages ranged from 2 to 60 years with a mean 27.6+/-11.2.The maximum numbers of patients were seen in the summer months of June, July and August.

Phuong HL, Thai k t (2009), A study stated that, it was conducted by the division of infectious diseases, academic medical center, Netherlands to diagnose dengue in 459 febrile patients. Based on a composite of the NSIAg-ELISA, Ab-ELISA and PCR results, 54(125%) patient had acute dengue. Positive and negative predictive values were 65% and 98% for the Ab– based diagnosis and 91% and 92% for NSIAg respectively.

ThammapaloS, ChongsuwiwatwongV, et al, 2005. A study stated that, aimed to determine the socio-demographic and environmental factors influencing potential breeding sites of the dengue vector in Phuket Province. Three hundred houses were recruited by cluster random sampling for larval inspection. Of all the types of water containers, a high proportion of tires and discarded items were infested by Aedes larva (42% and 32%, respectively). Due to the abundance of water tanks, jars for using water and discarded containers (1.7, 2.1, 0.8 per house), these were the main breeding sites (0.29, 0.35, and 0.28 infested containers per house, respectively). Buddhists' houses were significantly more likely to have a larvae-infested flower vase than Muslims' houses. Townhouses had relatively few infested containers, while those on rubber plantations had 18.3 times higher odds of having at least one container with larva. No window screens increased the odds of larva infestation in the discarded containers by 4.2 times. With this information and given a reliable piped water supply, the number of water containers can be reduced to minimize the breeding places. Garbage should be properly disposed of. Screens should be installed, if possible. Buddhists should be advised on the proper protection of flower vases.

Nakamura N et al (2010). A study stated that, Dengue cases reported to the national surveillance system were retrospectively examined. The number of reported cases per number of Japanese travellers to a dengue-endemic country was calculated to estimate the country-specific incidence of imported dengue virus infection. The incidence of dengue infection among Japanese travelers was compared between dengue high season and low season in each country using relative risk (RR) and associated 95% confidence intervals (CI). Among 540 Japanese residents who were reported as dengue cases from 2006 to 2010, the majority had travelled to Indonesia, India, the Philippines, and Thailand. The Relative risk of dengue infection among Japanese travellers during dengue high season versus low season was 4.92 (95% CI: 3.01–8.04) for the Philippines, 2.76 (95% CI: 1.67–4.54) for Thailand and 0.37 (95% CI: 0.15–0.92) for Indonesia.

Mônica da Silva-Nune, et al (2008). A study stated that, a comparison of dengue virus (DENV) anti body levels in paired serum samples collected from predominantly DENV-naïve residents in an agricultural settlement in Brazilian Amazonia (baseline sero prevalence, 18.3%) showed a sero conversion rate of 3.67 episodes/100 person-years at risk during 12 months of follow-up. Multivariate analysis identified male sex, poverty, and migration from extra-Amazonian states as significant predictors of base line DENV sero positivity, whereas male sex, a history of clinical diagnosis of dengue fever, and travel to an urban area predicted subsequent sero conversion.

Sinha N, Gupta N, et al (2008) A study stated that, Dengue is a worldwide condition spread throughout the tropical and subtropical zones between 30 degrees north and 40 degrees south. It is endemic in South East Asia, the Pacific, East and West Africa, the Caribbean and the Americas. Dengue

outbreaks are occurring almost every three yearly in Delhi for the last 12 years. The latest outbreak was in the year 2006, which started late in August, peaked in the month of October and lasted till late November. We describe here the clinical, hematological and biochemical data of 70 patients of dengue fever diagnosed as per WHO criteria in LokNayak Hospital, New Delhi during this outbreak. Hematological parameters were estimated by automated counter and dengue serology was done by capture ELISA technique.

Kohbk, Ngic, Kitay, et al(2008). A study stated that, aimed to determine the socio demographic and environmental factors influencing potential breeding sites of the dengue vector in Prince of Songkla University, Taiwan. The 100 houses were recruited for larval inspection. Of all the type of water containers, a high proportion of tyres and discarded items were infested by Aedes larva (42% and 32% respectively). Due to the abundance of water tanks, jars for using water and discarded containers (1.7, 2.1, 0.8 per house), these were the main breeding sites (0.29, 0.35, and 0.28 infested containers per house respectively).

Malavige GN, FernandoS (2008). A study stated that, Dengue viral infections are one of the most important mosquito borne diseases in the world. They may be asymptomatic or may give rise to undifferentiated fever, dengue fever, dengue hemorrhagic fever (DHF), or dengue shock syndrome. Annually, 100 million cases of dengue fever and half a million cases of DHF occur worldwide. Ninety percent of DHF subjects are children less than 15 years of age. At present, dengue is endemic in 112 countries in the world. No vaccine is available for preventing this disease. Early recognition and prompt initiation of appropriate treatment are vital if disease related morbidity and mortality are to be limited. This review

outlines aspects of the epidemiology of dengue infections, the dengue virus and its mosquito vector, clinical features and pathogenesis of dengue infections, and the management and control of these infections.

Sinda N, Gupta N, Thamb R, et al.(2008). A longitudinal study stated that, during 2004-06 in one arid and two semi arid dengue endemic district of Rajasthan by desert medicine Research centre (ICMR) Jodhpur India. The study aim was to describe surveillance and prevention of dengue in arid and semi arid districts. Results showed that in urban areas during all the seasons, adult house index of *Aedes aegypti* were maximum in desert zone (25) and least in semi –arid. The difference of AHI during three seasons' was statistically significant $\chi^2=16.1$, $p < 0.01$ for urban and $\chi^2 = 50.71$, $p < 0.01$ for rural. Water storage habits during summer season were emerged to be the risk factor of vector abundance in urban area of arid and semiarid settings.

Sharma k,Angel B ,et al(2007). A study stated that, to determine the sero prevalence of dengue fever and DHF in patients attending medical clinics or admitted in the ICU with febrile signs and symptoms of hemorrhages in CMC Ludhiana, Punjab, India. A sample of 168 (39.4%) was selected among 426 samples and were tested for IgM antibodies. Of the 168 positive cases, 159 were detected during the months of October and November.

Paramasivan R, Thenmozhi V, HierianJ, et al. A study stated that, a serological, virological and entomological investigation was carried out to confirm the etiology of the Dengue outbreak in Kanyakumari District in Tamilnadu. A total of 76 samples were collected from suspected cases of dengue

and among those samples 15 (20%) were found to be positive for dengue virus specific IgM antibodies. Dengue virus serotype – 3 was detected from a plasma sample by Toxo IFA test using virus specific monoclonal antibodies.

VijayKumar TS, Chandy S, Sathish N, et al (2008). A retrospective study was carried out to diagnose dengue infection, accomplished by the demonstration of specific IgM antibodies in blood, over a period of 5 years in CMC, Vellore, India. Serum samples from a total of 1426 individuals obtained over 5 years were tested for dengue specific antibodies. Of the 1426 patients, 693 were adults (>15 years) and 694 were children (<15 years) excluding 39 individuals whose age was not known. There were 807 males and 610 females (excluding 9 individuals whose status of sex was unknown). The study revealed that a total of 423 (29.3%) samples were positive for dengue IgM over the five year period.

Section II: - Review related to the signs and symptoms of dengue fever

Hope H. Biswas, et.al, (2012) Data from the multi-year, ongoing Pediatric Dengue Cohort Study of approximately 3,800 children aged 2–14 years in Managua, Nicaragua, were used to examine the frequency of clinical signs and symptoms by day of illness and to generate models for the association of signs and symptoms during the early phase of illness and over the entire course of illness with testing dengue-positive. The frequency of signs and symptoms varied by day of illness, dengue status, and disease severity. Dengue-positive associated with fever, headache, retro-orbital pain, myalgia, arthralgia, rash, petechiae, positive tourniquet test, vomiting, leukopenia, platelets $\leq 150,000$ cells/mL, poor capillary refill, cold extremities and hypotension. Day-by-day analysis of clinical signs and symptoms together with longitudinal statistical analysis showed significant associations with testing dengue-

positive and important differences during the early phase of illness compared to the entire course of illness. These findings stress the importance of considering day of illness when developing prediction algorithms for real-time clinical management.

Ganesananthan S, Anil R, Kwok FY, Sinniah M.(2008), A retrospective study of the gastrointestinal symptoms, signs and laboratory parameters in adult dengue patients admitted to Kuala Lumpur Hospital. Six hundred sixty-six patients with clinical and biochemical features consistent with dengue infection were identified. Patients were stratified into those who required intensive care and those who were managed in non high dependency wards. Serum alanine aminotransaminase (ALT) levels were normal in 22.8% of patients and 5.9% of patients had acute fulminant hepatitis. Abdominal pain ($p = 0.01$) and tenderness ($p < 0.001$), gastrointestinal bleed ($p < 0.001$), jaundice ($p < 0.001$), hepatomegaly ($p < 0.001$) and ascites ($p < 0.001$) were predictors of need for intensive care. We conclude that gastrointestinal manifestations are very common in dengue patients. Presence of abdominal pain and tenderness, gastrointestinal bleed, jaundice, hepatomegaly and ascites can be used to triage patients requiring intensive care.

Kapoor HK Bhais, etal (2007), A study stated that, Dengue infection is a major public health problem, affecting the general population in Southeast Asia. Hematologic aberrations in dengue infection include atypical lymphocytosis, coagulopathy, and predominant thrombocytopenia. Bleeding and other presentations in 30 Thai patients with dengue infection during an endemic season (2003) are presented. A review of the clinical presentation of these patients was performed. All had fever as a chief complaint. The three most common complaints were fever (100%), vomiting (90%), and cough (90%), respectively.

Concerning bleeding, only eight cases (26.6%) had signs of bleeding. Those manifestations included petechiae (seven cases, 23.3%) and melena (one case, 3.3%). Skin bleeding (petechiae) due to thrombocytopenia is the most common bleeding manifestation in dengue infection.

Wiwanikh V (2004), A study was undertaken to describe the clinical and laboratory data of the 185 cases of dengue fever / dengue hemorrhagic fever admitted in LokNayak Hospital, New Delhi, India. The mean age of the patients was 26 +/- 10 years. Fever was present in all the cases with headache (61.6%), backache (57.8%), vomiting (50.8%) and abdominal pain (21%). Hemorrhagic manifestation in the term of a positive tourniquet test (21%), gum bleeding and epistaxis (40%), hematemesis (22%), skin rashes (20%) and melena (14%) were also observed. Hepatomegaly and splenomegaly were observed in 10% and 5% of cases respectively. Laboratory investigation revealed thrombocytopenia in 61.39% cases; leucopenia and hemo concentration were found in 68% and 52% of the cases respectively.

Section III: - Review related to the prevention of dengue fever

Luz PM, Codeço CT, Medlock J et al (2009), A study stated that it was a Insecticide-based vector control is the primary strategy for curtailing dengue transmission. We used a mathematical model of the seasonal population dynamics of the dengue mosquito vector, *Aedes aegypti*, both to assess the effectiveness of insecticide interventions on reducing adult mosquito abundance and to predict evolutionary trajectories of insecticide resistance. We evaluated interventions that target larvae, adults, or both. We found that larval control and adult control using ultra-low-volume insecticide applications can reduce adult mosquito abundance

with effectiveness that depends on the frequency of applications. We also found that year-long continuous larval control and adult control, using either insecticide treatment of surfaces and materials or lethal ovitraps, imposed the greatest selection for resistance. We demonstrated that combined targeting of larvae and adults at the start of the dengue season is optimal. This intervention contrasts with year-long continuous larval control policies adopted in settings in which dengue transmission occurs.

Ahmed Itrat, Abdullah Khan, et al (2008), A study stated that it was a cross-sectional pilot study was conducted among people visiting tertiary care hospitals in Karachi. Through conversation, questionnaire was administered through a face-to-face unprompted interview with 447 visitors. Knowledge was about 89.9% of individuals interviewed and heard of dengue fever. Sufficient knowledge about dengue was found in Aga Khan University Hospital and 33% in Civil Hospital Karachi. Literate individuals were relatively more well-informed illiterate people ($p < 0.001$). Knowledge based upon preventive measures was found to be predominantly focused rather than eradication of mosquito population (17.3%). Use of anti- mosquito spray was the most prevalent (48.1 as the most important and useful source of information on the disease.

Axel Keroegel, et al (2006), A study stated that it was a Cluster randomized trials were implemented to measure the effective control of dengue vector with curtains and water container covers treated with insecticide in Mexico, Venezuela. 18 urban sector in Veracruz and 18 in Trujillo were selected respectively. In Vera Cruz the intervention comprised curtains treated with lambda cyhalothrin and pyriproxyfen chips. In Trujillo the intervention

comprised curtains treated with long lasting deltamethrin plus water jar covers of the same material. The study concluded that windows curtains and domestic water container covers treated with insecticide can reduce densities of dengue vector to low level and potentially affect dengue transmission.

Phuanukoonnon S, Mueller I, Bryan JH. (2006), A study revealed that it was a cross sectional study which was conducted to investigate the influence of larval control methods, water used and weekly cleaning of containers on the presence of *Aedes aegypti* larva in water storage containers in rural and urban household in Khonkaen, Australia. Larval survey covered 966 households and 5821 containers were inspected. The containers most frequently infested with larvae were rectangular cement containers which were used for storing water, for bathing (rural 37.25%, urban 35%) and flushing the toilets (rural 35.7% urban 34.3%). Keeping fish (adjusted odds ratio 0.08-0.016) was the most effective method of control. Correctly covering containers with lids had similar effect (AOR; 0.10-0.25) when used on jars for storing drinking water.

Orellano PW, Pedroni E(2008), A study stated that, a comparative study stated that it was carried out to evaluate the cost – benefit of an intervention utilizing fumigation against adult mosquitoes in Clarinda, Argentina. A program to control both adult mosquitoes and immature forms was compared to a non intervention hypothesis. There were 176 cases of dengue in Clarinda out of which five were autochthonous and the net present value was US\$ 303,602. The result suggested that vector control including fumigation of adult mosquitoes, should be considered in high risk areas as a cost- effective option for non endemic countries.

Abubakar, Liping Wong, etal, (2013) A focus group study aimed to provide an in-depth understanding of the meaning of dengue fever amongst people living in a dengue endemic region, dengue prevention and treatment-seeking behavior. A total of 14 FGDs comprising 5 Malay, 5 Chinese and 4 Indian groups were conducted between 16th December, 2011 and 12th may, 2012. Each FGD was composed of between 5 and 8 participants of the same ethnic group (total 84 participants) of 6 different socio demographic backgrounds. The mean (SD) age of the sample was 39.8.(15.8) years, age range 21 to 70 years old.

SECTION-IV: Review related to Knowledge and Practice of Dengue Fever.

Gunasekar, et.al, (2012) A study conducted that a prospective, cross sectional study in 2005/2006 to determine the knowledge attitudes and practices (KAP) regarding dengue fever (DF) in a suburban of Colombo district. Data was collected using a pre-tested interviewer-administered questionnaire to assess the knowledge, attitudes and practices of 349 randomly selected residents in the area. Almost all the participants had heard of DF (98%), the media being the most quoted source of information. Based on the scoring system, only 58% had satisfactory knowledge on the symptoms, management and transmission of dengue. Furthermore, 37% of the participants demonstrated satisfactory attitudes and 85% claimed to have used good practices towards dengue. The participants demonstrated gaps in knowledge and poor attitude which may affect the level and frequency of preventive practices. The findings of the study highlight the need for further information, education and communication programs in the community.

RamaniBai.R and Kanniga.S, (2011) Study stated that, Dengue is one of the mosquito-borne diseases spread by *Aedes aegypti* and *Aedes albopictus*. Dengue fever has been reported regularly in Tamil Nadu, especially in Chennai. In the year 2001, 737 cases were reported from Chennai out of a total of 816 cases for the whole state. In the absence of a vaccine for dengue, control of vector population is the best option. This could be effective only if there is community participation. In order to assess the knowledge of housewives in peri urban areas of south Chennai, a knowledge, attitude and practice (KAP) survey was carried out in 2009. The study showed that 77.9% of the study population was unaware of dengue and were not aware of the behavior of its vector like breeding sites, biting time, etc. To prevent mosquito bites, 45.6% of the respondents used coils, but none of the interviewees adopted any preventive measures against this day-biting mosquito. This survey revealed that the knowledge regarding dengue was too poor among the people.

Amar Taksande, Department of Pediatrics, JNMC,(2013) The study stated that it was a descriptive cross-sectional study concerning Knowledge, Attitudes, and Practices of Dengue Fever prevention among the people in Rural Hospital of Central India. This study was residents of Wardha Districts, Maharashtra State, who were living there for at least one year. A 410 adults (aged 18 years and above) were interviewed using a pre-tested questionnaire regarding their knowledge, attitude and practices about DF. Results: 43.91 % respondents belonged to the age group of 30 – 44 years, 84.15 % respondents were married and 31.21 % respondents were high school certificate (31.21 %). 76.58 % respondent knew that the vector for dengue is a mosquito. Whereas 47.8 %

respondents knew that human to human spread occurs in dengue and mainly transmitted by mosquito bites. Around 60.48 % of them were aware of fever as the presenting symptom. With regards to the knowledge of the preventive measures, respondents were generally aware of mosquito coils/liquid (57.08 %) and spraying (35.12 %). 74.14 % respondents knew about breeding places of mosquitoes. 94.64 % respondents strongly agreed and agreed that dengue is a serious illness. Only 17.06 % respondents strongly agreed and agreed that they are at risk of getting dengue whereas 62.92 % was not sure about the risk. Common preventive practices that were prevalent in the respondents were use of mosquito coils/liquid (45.12 %); cleaning the house (28.30 %) and mosquito spray (23.42 %). Important sources of information about DF were from television (59.75 %) followed by Friends/relatives.80 %).

[PalanivelChinnakali](#), [NishantGurnani](#), et.al (2012), A cross-sectional study stated that it was conducted among persons visiting a tertiary care hospital in New Delhi. A systematic sampling procedure was adopted and a pretested questionnaire was used. A total of 215 individuals were interviewed. Majority of the respondents (96.3%) had heard about dengue. The important sources of information were television (54.9%) and newspaper/magazines (51.7%). Around 89% of the study participants considered dengue as “serious problem”. Nearly 86% participants were aware of the spread of dengue by mosquitoes while 73% were aware of one of the correct breeding sites of *Aedes* mosquito. Mosquito mats/liquidators were used by 61% of respondents, coils by 56% and repellent creams by 22%

Sami Abdo Radman Al (2013), A cross-sectional study conducted in a semi-urban Town of Malaysia, using a structured questionnaire covering sociodemography, knowledge related to dengue, knowledge related to Aedes mosquito and preventive measures against the disease. For comparison of survey responses, chi-square test was applied for categorical data. To explore the factors affecting the practice of dengue control, a linear regression model was introduced. Almost all of the respondents (95%) had heard about dengue. Overall, misconceptions of dengue transmission were identified and the practice of dengue control in the study population was insufficient. About half (50.5%) had misconceptions that Aedes can breed in dirty water and the preferred biting time is dusk or sunset (45.6%). Only 44.5% of the households surveyed had covered their water containers properly. Significant associations were found between knowledge scores of dengue and age ($P = 0.001$), education level ($P = 0.001$), marital status ($P = 0.012$), and occupation ($P = 0.007$). In regression analysis, only the knowledge of dengue was significantly and positively associated with practice on dengue control.

Begonia C. Yboa¹, Leodoro J. Labrague (2013), A study stated that, a cross sectional design was adopted for this investigation. Convenience samples of six hundred forty six (646) residents who were visiting the rural health units in different municipalities of Samar, Philippines were taken as participants in study. More than half of the respondents had good knowledge (61.45%) on causes, signs and symptoms, mode of transmission, and preventive measures about dengue. More than half of the respondents used dengue preventive measures such as fans ($n = 340$, 52.63%), mosquito coil ($n = 458$, 70.90%), and bed nets ($n = 387$,

59.91%) to reduce mosquitoes while only about one third utilized insecticides sprays (n = 204, 31.58%) and screen windows (n = 233, 36.07%) and a little portion used professional pest control (n = 146, 22.60%). There was no correlation between knowledge about dengue and preventive practices (p=0.75). Television/Radio was cited as the main source of information on dengue infections. Findings suggest that better knowledge does not necessarily lead to better practice of dengue measures. Educational campaigns should give more emphasis dengue transmissions and on cost effective ways of reducing mosquito and preventing dengue such as environmental measures and control. Furthermore, wide range of information, skills and support must be provided by the government to increase dengue awareness among residents.

Syed, M., Saleem, T., Syeda, U et,a (2010), A study stated that, a cross sectional survey was conducted among selected communities with different socio-economic backgrounds in Karachi, Pakistan. A sample size of 440 adults (aged 18 years and above) were interviewed using a pre-tested questionnaire regarding their knowledge, attitude and practices about dengue fever. A composite scoring system, based on the answers given in the questionnaire, was used to establish the level of awareness in the population. The division of the higher and lower socioeconomic groups was based on their income. Data from 400 respondents (244 males, 156 females) was used for primary analysis. About thirty five percent of the samples had adequate knowledge about dengue fever and its vector. Knowledge had significant associations with education (p = 0.004) and socioeconomic status (p = 0.02). The high socioeconomic group showed better preventive practices.

Poonam Ramesh Naik, AbhaySubhashraoNirgude, et al,(2011). A study stated that, a community based cross sectional study was undertaken in Seshambabudem village of Tippathymandal, Nalgonda district during February to May 2011. The study area constitutes 315 households with population of 1469. All the households were included by census method. From each household an individual aged 19-60 years were interviewed by using pre designed, pre tested semi structured questionnaire. Likewise 292 individuals from 315 households were enrolled in the study. Data was compiled and analyzed and results were shown in percentages. Majority of the respondents (43.2%) were in the age group of 15-30 years. As per their literacy status, 45.2% were illiterate. As per modified B G Prasad's classification of socio-economic status, those belonging to high class and lower middle class of socio-economic status were 25.3% and 18.5% respectively. The most common cause of dengue cited was mosquito bite (60.61%). Around 57.53% of them were aware of fever as the presenting symptom. However more than a quarter (34.9%) of the respondents were not aware of any of the symptoms. Half of the respondents (51.36%) were aware of preventive measures such as mosquito repellents like matt, liquid repellents/coils. Common preventive practices that were prevalent in the community were use of mosquito repellents (46.57%), prevent water stagnation (13.01%), cleaning the house (34.93%). Very few of them practiced weekly emptying of containers (9.58%) and use of mosquito nets (11.64%). Important sources of information about dengue were from TV/ Radio (39.04%). Conclusion: Our findings highlight the need for further information, education and communication programs to identify barriers to action and to seek ways to translate population knowledge about dengue into positive preventive practices.

NahlaKhamisRagab Ibrahim, Adnan Al-Bar, et al,(2009).A study stated that, a cross-sectional approach was conducted to assess knowledge, attitudes and practice (KAP) of high school female students, teachers and supervisors towards Dengue fever (DF), and to determine scoring predictors of high school students' knowledge and practice scores. A multistage, stratified, random sample method was applied. A total of 2693 students, 356 teachers and 115 supervisors completed confidential self-administered questionnaires. Students obtained the lowest mean knowledge score compared to the other two groups ($F = 51.5$, $P < 0.001$). A positive family history of DF (a OR = 2.05; 95% CI = 1.15–3.64), having literate mothers (\geq secondary education) and students' age ≥ 17 were the predictors of high students' knowledge score. The only predictor of high practice score was obtaining high knowledge score (a OR = 2.06; 95% CI = 1.73–2.44).

CHAPTER - III

RESEARCH METHODOLOGY

Research methodology involves systemic procedure which includes research design, the setting the sample, criteria for sample selection, sample technique development and description of tool and testing of the tool, the procedure for data collection and the plan for data collection.

RESEARCH APPROACH

The section of research approach is a basic procedure for the conduction of research studies. The research approach is an “EVALUATIVE APPROACH”.

RESEARCH DESIGN

The research design is the overall plan for addressing a researcher question including specification for enhancing the study’s integrity. (Polit and beck, 2001)

Research design is can be defined as a blue print to conduct a research study, which involves the description of research approach, study setting, sample size, sample technique, tools and data collection and analysis to answer a specific questions (or) for testing research hypothesis.

Design used in the study was “Quasi experimental study” (only pretest posttest design) was adapted for this study

VARIABLES:

Variables are qualities, properties (or) characteristics of person, things (or) situations that change (or) vary

INDEPENDENT VARIABLES:

It is a stimulus (or) activity that is manipulated or varied by the researcher to create the effect on the dependent variable.

The independent variable in the present study was video teaching programme.

DEPENDENT VARIABLE:

It is the outcome (or) response due to the effect of the independent variables, which researcher wants to predict (or) explain.

The dependent variable in the present study was knowledge, attitude and practice of control and prevention of dengue fever among Housewives.

ATTRIBUTE VARIABLES:

The attribute variables are age, education, income, source of information, type of house, number of person in home, type of family, type of drainage system, type of solid waste disposal.

SETTING OF THE STUDY:

This study was carried out in olapalayam, rural community. The rural community is 3 kilometers far from sresakthimayeil institute of nursing and research, kumarapalayam and covers a population of 1228. Most of them in the rural community are power loom employees.

POPULATION:

The term population refers to the aggregate (or) totality of all the objects, subjects (or) members that confirm to a set of specifications

(polit and hunguler, 1999).

All the Housewife were the population for the study.

TARGET POPULATION:

It refers to the population that the researcher wishes to make a generalization. In this research the target population was Housewife.

ACCESSIBLE POPULATION:

It refers to the aggregate of cases which conform to the designed criteria which is accessible to the researcher as the pool of subjects (or) objects. In this study the population consists of Housewife in olapalayam rural community.

SAMPLE SIZE:

The sample size is 50.

SAMPLING TECHNIQUE:

The sampling technique used in this study was convenience sampling.

CRITERIA FOR SAMPLE SELECTION:**INCLUSIVE CRITERIA:**

- ❖ Housewife who are willing to participate in the study.
- ❖ Housewife who are able to understand and speak Tamil.

EXCLUSIVE CRITERIA:

- ❖ Housewife who are not willing to participate in the study.
- ❖ Housewife who have vision and hearing problem.
- ❖ Housewife who are affected by dengue fever.
- ❖ Housewife who had pervious exposure to this kind of teaching.

DEVELOPMENT OF THE TOOL:

The tool which was used in this study consists of three parts.

- PART I:** Demographic variables such as age, education, income, source of information, type of house, number of person in home, type of family, type of drainage system, type of solid waste disposal.
- PART II:** Structured questionnaire with 30 multiple choice questions to assess the knowledge on control and prevention of dengue fever.
- PART III:** Observational checklist with 20 questions to observe the practice on control and prevention of dengue fever.

CONTENT VALIDITY:

Validity is the degree to which an instrument measures what is suppose to measure (**Polit and Beck, (2004)**).

Validity of the content was done by Mrs. J. Priya, M.D., Civil Assitant surgeon in Erode G.H., Mr. P. Ravi, M.B.B.S., D.Ch, pediatriician in baby clinic, Mrs.M.Arockia Mary, M.Sc (N), reader in community health nursing, Mrs.B.Kavitha, M.Sc (N), professor, in community health nursing, Mrs.S.Thangamuneeswari, M.Sc. (N), associate professor, in community health nursing. Based on the suggestions of the experts corrections have been made. The final copy of the content and questionnaire was prepared.

Language validity for English was done by Mrs. P.K.Uma, Ph.D., Assotiace Professor in department of English. The tool was translated into Tamil with help of Mr. K.Esakki, Ph.D., Assitant Professor, in department of Tamil.

RELIABILITY OF THE TOOL:

Reliability is the consistency with which it measure the target attribute.

(Polit and Beck, 2004)

The reliability of the structured interview questionnaire was established by testing the stability It was done by test retest method .The value was found to be $r=0.92$. So the interview questionnaire was found to be reliable. The reliability of the observational checklist done by adopting inter-rater method, the value was found to be $r=0.9$. So the observational checklist was found to be reliable.

PILOT STUDY:

Pilot study is miniature trail run of the methodology planned for the major research study, which facilitates to improve the methodology of the study, can assess the feasibility of the study, and may identity the problems that may faced by the researcher in actual large research project. **(Suresh k. Sharma, 2012)**

Pilot study was conducted in Pallakapalayam. The purpose of the study was explained to the Housewife. After getting the written consent from Housewife researcher conducted pilot study. Researcher collected demographic data of Housewife and assess the pre-test knowledge and practice by using structured knowledge questionnaire and checklist on control and prevention of dengue fever. On the same day, video teaching programme on control and prevention of dengue fever was given. Following to that doubts were clarified by the researcher. After 4 days, post-test knowledge and practice was assessed by using structure knowledge questionnaire and checklist on control and prevention of dengue fever.

The pre test and post test score of the structured questionnaire and checklist is calculated. The pre test and post test mean score of knowledge is 10.8 and 19.2 The pre test and post test standard deviation of knowledge is 2.7 and 2.1 and t value is 11.55 which is significant ($11.55 > 2.05$). The pre test and post test mean score of practice is 9.6 and 17.4 The pre test and post test standard deviation of practice is 2.3 and 1.1 and t value is 6.8 which is significant ($6.8 > 2.05$). The correlation between knowledge and practice was done by using Karl Pearson's correlation. The r value is 1.01 which shows the positive correlation ($1.01 > 0.87$). To analyze the demographic variables the chi square value has been calculated.

Through the pilot study we came to know the accessibility, feasibility, availability of the samples, exact timing for the data collection, expenses needed for the study, total time (number of days) needed for the study, the data analysis methods.

DATA COLLECTION PROCEDURE:

Data collection is the gathering of information needed to address a research problem. (Polit and Hungler, 2011)

The data collection was done over a period of 4 weeks. The permission was obtained from the principal and community leader. The study was conducted in Olapalayam rural community. The investigator visited the area and did an extensive survey to identify the Housewife who are meeting the inclusion criteria. Then she obtained written consent from the subjects to participate in this study. She selected 50 Housewife through non probability convenience sampling technique. She gained their confidence by talking to them about their life and work. In the initial encounter, no attempt was made to collect data for this study. Good rapport was developed with Housewives to get their co-operation for the study.

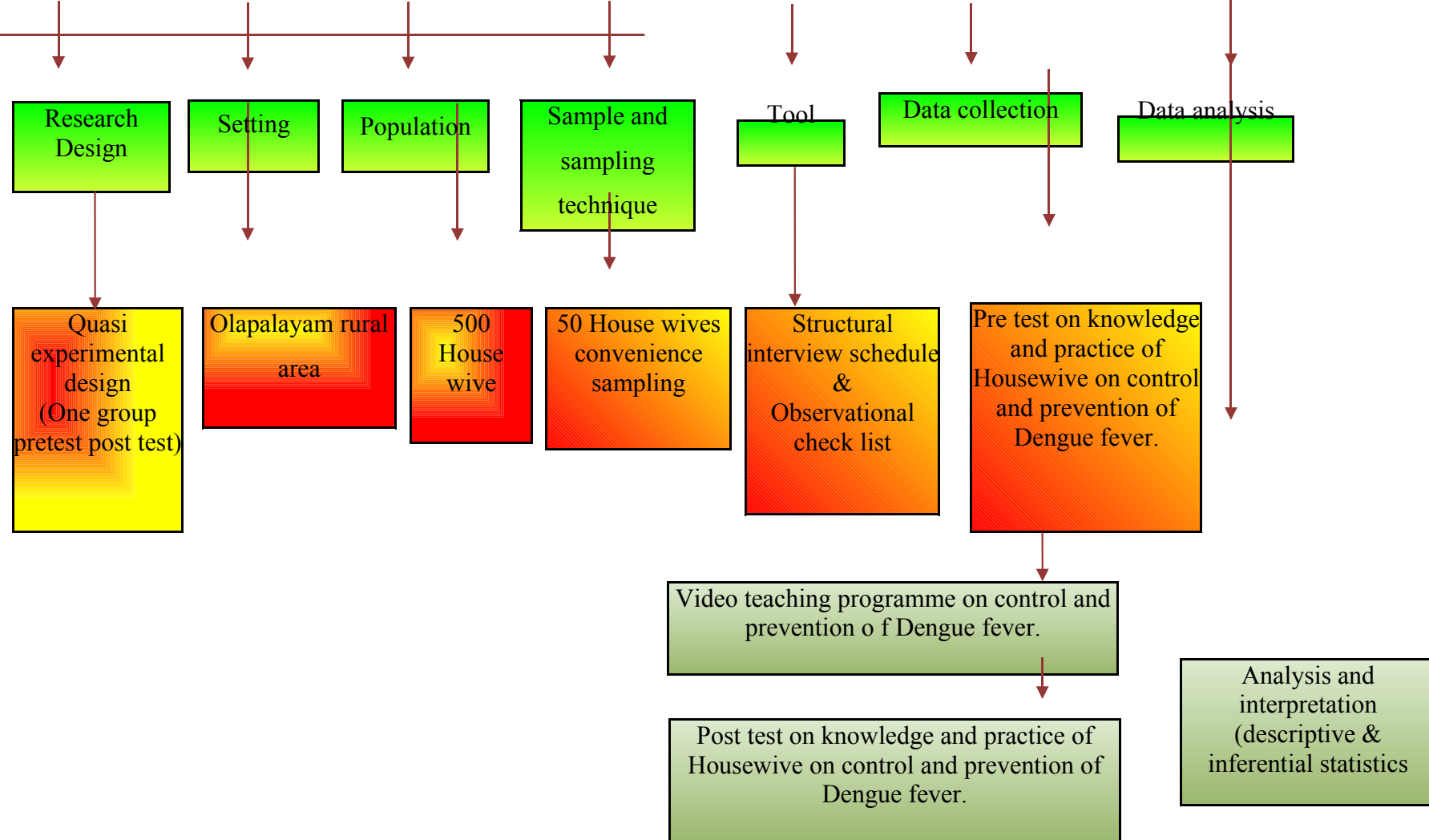
During pre test, investigator were interviewed with the help of the questionnaire and observed with the check list to assess the knowledge and practice regarding control and prevention of dengue fever. After pre test, video teaching programme was given on meaning, causes, signs and symptoms, control and prevention of dengue fever. A post test was conducted after a week of video teaching programme.

PLAN FOR DATA ANALYSIS:

The data obtained was analyzed using descriptive statistics for demographic variables and inferential statistics such as paired't test to compare the mean pre-test and post-test over all knowledge, area wise knowledge and practice score, and to find out the correlation between knowledge and practice by using Karl Pearson's correlation .Chi-square was used to find the association between post test knowledge and practice score with demographic variables.

SCHEMATIC PRESENTATION OF RESEARCH METHODOLOGY

EFFECTIVENESS OF VIDEO TEACHING PROGRAMME ON CONTROL AND PREVENTION OF DENGUE FEVER



CHAPTER IV

ANALYSIS AND INTERPRETATION

This chapter deals with the analysis and interpretation of the data collected to assess the effectiveness of the video teaching programme on knowledge and practice regarding control and prevention of Dengue fever among Housewives.

The analysis is a process of organizing and synthesizing data in such a way that research questions can be answered and hypothesis tested. **Polit and Hungler, (1999)**

Data were collected from 50 Housewife in olapalayam rural area using a structured interview questionnaire for knowledge and observational check list for practice and analyzed using inferential statistics.

The data has been tabulated and organized as follows,

- Section A:** Distribution of demographic variables.
- Section B:** Analysis and Comparison between pre test and post test knowledge regarding control and prevention of dengue fever among Housewife
Comparison between pre test and post test area wise knowledge regarding control and prevention of dengue fever among Housewife
- Section C:** Analysis and Comparison between pre test and post test practice on control and prevention of Dengue fever among Housewife.
- Section D:** Correlation between knowledge and practice regarding control and prevention of Dengue fever among Housewife
- Section E:** Association between post test score of knowledge and practice with demographic variables.

SECTION - A

TABLE - 1

**Frequency and percentage distribution of samples based on their
Demographic variables**

N=50

| S.NO. | DEMOGRAPHIC VARIABLES | FREQUENCY (f) | PERCENTAGE (%) |
|--------------|----------------------------------|--------------------------|---------------------------|
| 1. | Age of Housewife | | |
| 1.1 | 26-30 years | 18 | 36 |
| 1.2 | 31- 35 years | 7 | 14 |
| 1.3 | 36- 40 years | 10 | 20 |
| 1.4 | Above 40 years | 15 | 30 |
| 2 | Educational status | | |
| 2.1 | Illiterate | 11 | 22 |
| 2.2 | School ,level | 34 | 68 |
| 2.3 | Under graduate | 5 | 10 |
| 2.4 | Post graduate | 0 | 0 |
| 3 | Monthly income of the family | | |
| 3.1 | Below Rs. 2000 | 3 | 6 |
| 3.2 | Rs. 20001- 3000 | 13 | 26 |
| 3.3 | Rs. 3001- 4000 | 6 | 10 |
| 3.4 | Above Rs. 4000 | 28 | 56 |
| 4 | Source of information | | |
| 4.1 | Health personnel | 19 | 38 |
| 4.2 | Friends | 6 | 12 |
| 4.3 | Relatives | 4 | 8 |
| 4.4 | Mass media | 21 | 42 |
| 5 | Type of family | | |
| 5.1 | Nuclear family | 37 | 74 |
| 5.2 | Joint family | 11 | 22 |
| 5.3 | Extended family | 2 | 4 |
| 6 | Total number of persons in home | 0 | 0 |
| 6.1 | One | 11 | 22 |
| 6.2 | Two | 10 | 20 |
| 6.3 | Three | 29 | 58 |
| 6.4 | Four and above | | |
| 7 | Type of house | | |
| 7.1 | Hut | 2 | 2 |
| 7.2 | Kutchha | 25 | 50 |
| 7.3 | Pucca | 23 | 56 |

| | | | |
|-----|------------------------------|----|----|
| 8 | Type of drainage system | | |
| 8.1 | Open drainage | 21 | 42 |
| 8.2 | Closed drainage | 20 | 40 |
| 8.3 | Kitchen garden | 7 | 14 |
| 8.4 | Soakage pit | 2 | 4 |
| 9 | Type of solid waste disposal | | |
| 9.1 | Open dumping | 12 | 24 |
| 9.2 | Throw in to street | 3 | 6 |
| 9.3 | Burning | 6 | 12 |
| 9.4 | Collected by municipality | 28 | 58 |

According to age most of the Housewife were from the age group of 26 to 30 years 18 (36%) and less from 31 to 35 years 7 (14%)

According to the educational status most of them had school level education 34(68%) and remaining had illiterate 11(22%), undergraduate 5 (10%).

According to the income, most of them belong to monthly income of Above Rs. 4000 28(56%), and remaining belong to below Rs. 2000 3(6%), Rs. 3001-4000 6(12%), Rs. 2001-3000 13(26%).

According to the Source of information, most of them got information from mass media 21(42%), remaining got information from health personnel 19(38%) , friends 6(12%),and relatives 4(8%).

According to the type of families, most of them belong to nuclear 37(74%), remaining belong to joint family 11(22%), &extended family 2(4%).

According to the number of persons in home, most of them had four and above persons 29(58%), remaining had two persons 11(22%), three persons 10(20%).

According to the type of drainage, most of them practiced open drainage 21(42%), remaining practiced closed drainage 20(40%), kitchen garden 7(14%), soakage pit 2(4%).

According to the type of solid waste disposal, most of them practiced method was collected by municipality 28(56) remaining practiced open dumping 13(26%) throw in to street 3(6%), and burning 6(12%).

SECTION - B

Analysis and Comparison between pre test and post test knowledge of Housewife regarding control and prevention of dengue fever.

TABLE – 2

Analysis between pre test and post test level of knowledge score on control and
prevention of dengue fever among Housewife

N=50

| KNOWLEDG E | INADEQUATE | | MODERATELY ADEQUATE | | ADEQUATE | |
|---------------|------------|-----|------------------------|-----|----------|-----|
| Pre test | 45 | 90% | 3 | 6% | 2 | 4% |
| Post test | 2 | 4% | 33 | 66% | 15 | 30% |

Table 2 shows that, among 50 samples in pre test, 2 (4%) samples had adequate knowledge, 3 (6%) had moderate knowledge and 45 samples (90%) had inadequate knowledge regarding control and prevention of dengue fever.

In post test, 15 (30%) samples had adequate knowledge, 33 (66%) had moderate knowledge and 2 samples (4%) had inadequate knowledge regarding control and prevention of dengue fever.

The above score was interpreted by fixing the scale of above 70% as adequate, 51-70% as moderate and below 50% as inadequate knowledge.

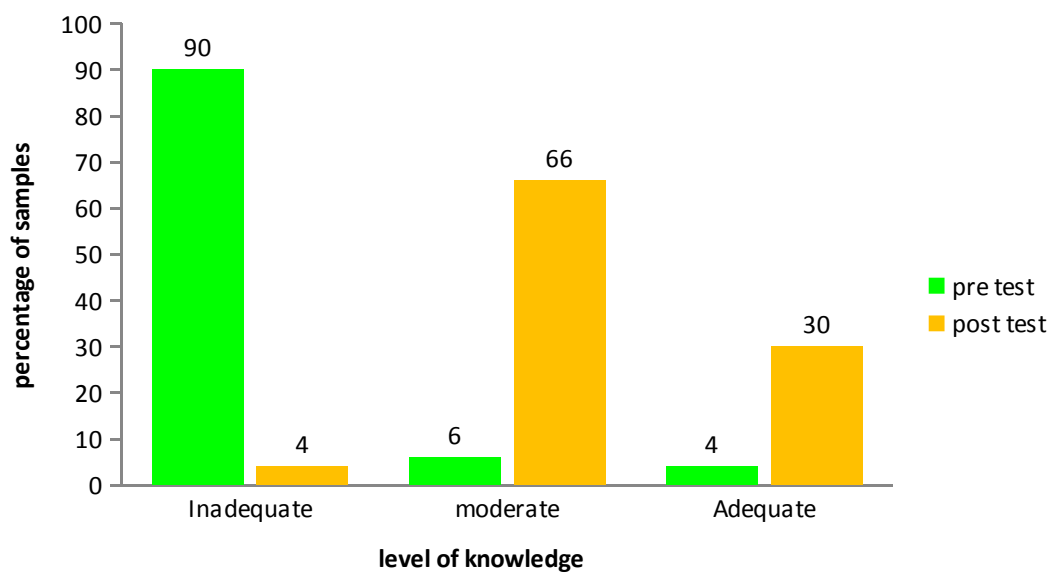


Fig: 3, Bar diagram shows percentage of pre- test and post- test knowledge score on control and prevention of dengue fever among Housewife.

TABLE: 3

Comparison of mean standard deviation and 't' test scores of Housewife in pre and post test over all knowledge regarding control and prevention of Dengue fever

N=50

| KNOWLEDGE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|------------------|-------------------|-------------|---------------|---------------------------|------------------|--------------------|
| Pre test | 30 | 12.1 | 40 | 3.4 | 14.8* | 2.02 |
| Post test | | 19.9 | 66 | 2.8 | | |

***Significant at $p > 0.05$ level**

Table 3 showed that, the mean score of pre and post test overall knowledge were 12.1 and 19.9 respectively. The standard deviation of pre and post test was 3.4 and 2.8.

The calculated t' value was 14.8 which was greater than the table value (14.8 > 2.02). It was significant at $p > 0.05$ level. So research hypothesis is accepted

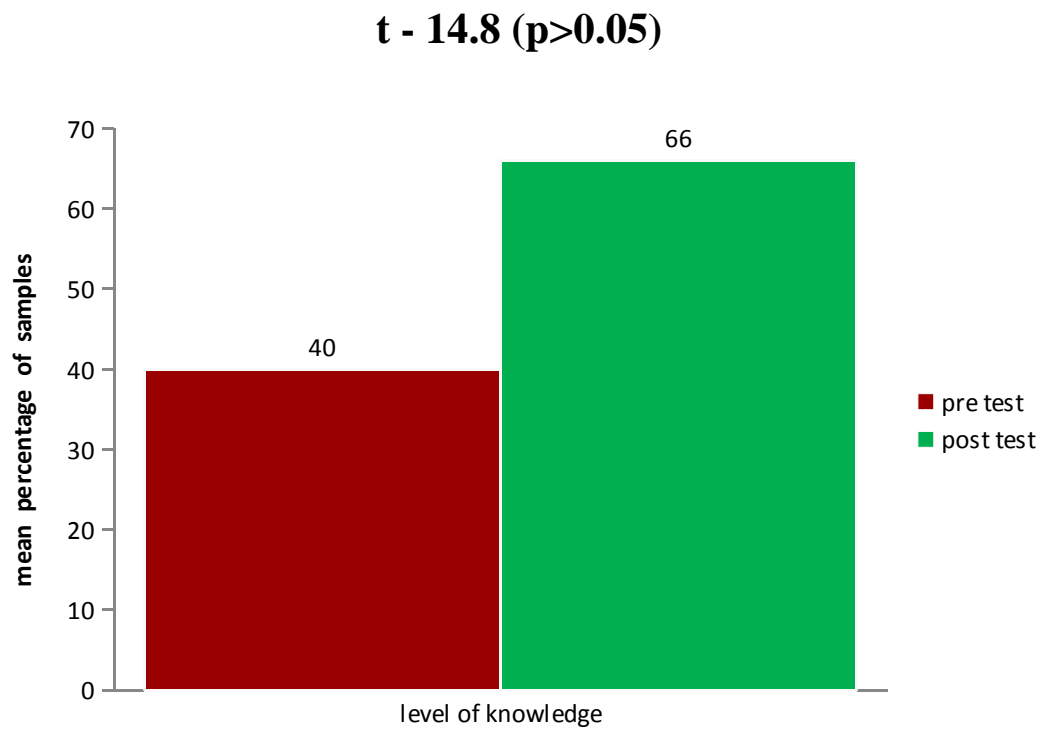


Fig: 4 Bar diagram shows mean percentage of pre- test and post- test knowledge score on control and prevention of dengue fever among Housewife.

**Comparison between pre test and post test area wise knowledge regarding
control and prevention of dengue fever among Housewife**

TABLE - 4

**Comparison of mean, standard deviation and 't' test scores of Housewife in pre
and post test knowledge regarding definition of Dengue fever**

N=50

| AREA OF KNOWLEDGE | VARIABLE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|-------------------|-----------|------------|------|--------|--------------------|-----------|-------------|
| Definition | Pre test | 2 | 0.98 | 49 | 0.4 | 7.7 | 2.02 |
| | Post test | | 1.46 | 73 | 0.5 | | |

***Significant at $p>0.05$ level**

Table 4 showed that, the mean score of pre and post test definition of Dengue fever were 0.98 and 1.46 respectively. The standard deviation of pre and post test was 0.4 and 0.5.

The calculated 't' value was 7.7 which was greater than the table value ($7.7>2.02$). It was significant at $p>0.05$ level. So research hypothesis is accepted

TABLE - 5

Comparison of mean, standard deviation and 't' test scores of Housewife in pre and post test knowledge regarding causes of Dengue fever

N=50

| AREA OF KNOWLEDGE | VARIABLE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|-------------------|-----------|------------|------|--------|--------------------|-----------|-------------|
| Causes | Pre test | 6 | 1.5 | 25 | 0.7 | 14.6* | 2.02 |
| | Post test | | 3.8 | 63 | 0.8 | | |

***Significant at $p>0.05$ level**

Table 5 showed that, the mean score of pre and post test causes of Dengue fever were 1.5 and 3.8 respectively. The standard deviation of pre and post test was 0.7 and 0.8.

The calculated 't' value was 14.6 which was greater than the table value (14.6 > 2.02). It was significant at $p>0.05$ level. So research hypothesis is accepted.

TABLE - 6

Comparison of mean, standard deviation and 't' test scores of Housewife in pre and post test knowledge regarding mode of transmission of Dengue fever

| AREA OF KNOWLEDGE | VARIABLE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|----------------------|-----------|------------|------|--------|--------------------|-----------|-------------|
| Mode of transmission | Pre test | 4 | 1.46 | 37 | 0.7 | 9.8* | 2.02 |
| | Post test | | 2.58 | 65 | 0.6 | | |

***Significant at $p > 0.05$ level**

Table 6 showed that, the mean score of pre and post test mode of transmission of Dengue fever were 1.46 and 2.58 respectively. The standard deviation of pre and post test was 0.7 and 0.6.

The calculated 't' value was 9.8 which was greater than the table value (9.8 > 2.02). It was significant at $p > 0.05$ level. So research hypothesis is accepted.

TABLE - 7

Comparison of mean, standard deviation and 't' test scores of Housewife in pre and post test knowledge regarding signs and symptoms of Dengue fever

N=50

| AREA OF KNOWLEDGE | VARIABLE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|-------------------|-----------|------------|------|--------|--------------------|-----------|-------------|
| Signs & symptoms | Pre test | 6 | 2.34 | 39 | 1.0 | 8.6* | 2.02 |
| | Post test | | 3.94 | 65 | 0.7 | | |

***Significant at $p>0.05$ level**

Table 7 showed that, the mean score of pre and post test signs & symptoms of Dengue fever were 2.34 and 3.94 respectively. The standard deviation of pre and post test was 1.0 and 0.7.

The calculated 't' value was 8.6 which was greater than the table value ($8.6 > 2.02$). It was significant at $p > 0.05$ level. So research hypothesis is accepted.

TABLE - 8

Comparison of mean, standard deviation and 't' test scores of Housewife in pre and post test knowledge regarding complication of Dengue fever

N=50

| AREA OF KNOWLEDGE | VARIABLE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|-------------------|-----------|------------|------|--------|--------------------|-----------|-------------|
| Complication | Pre test | 2 | 0.52 | 26 | 0.6 | 4.0* | 2.02 |
| | Post test | | 0.96 | 48 | 0.4 | | |

***Significant at $p>0.05$ level**

Table 8 showed that, the mean score of pre and post test complication of Dengue fever were 0.52 and 0.96 respectively. The standard deviation of pre and post test was 0.6 and 0.4.

The calculated t' value was 4.0 which was greater than the table value (4.0>2.02). It was significant at $p>0.05$ level. So research hypothesis is accepted.

TABLE - 9

Comparison of mean, standard deviation and 't' test scores of Housewife in pre and post test knowledge regarding prevention of Dengue fever

N=50

| AREA OF KNOWLEDGE | VARIABLE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|-------------------|-----------|------------|------|--------|--------------------|-----------|-------------|
| Prevention | Pre test | 10 | 5.2 | 52 | 1.8 | 6.0* | 2.02 |
| | Post test | | 7.0 | 70 | 1.1 | | |

***Significant at $p>0.05$ level**

Table 9 showed that, the mean score of pre and post test prevention of Dengue fever were 5.2 and 7.0 respectively. The standard deviation of pre and post test was 1.8 and 1.1.

The calculated 't' value was 6.0 which was greater than the table value (6.0 > 2.02). It was significant at $p>0.05$ level. So research hypothesis is accepted

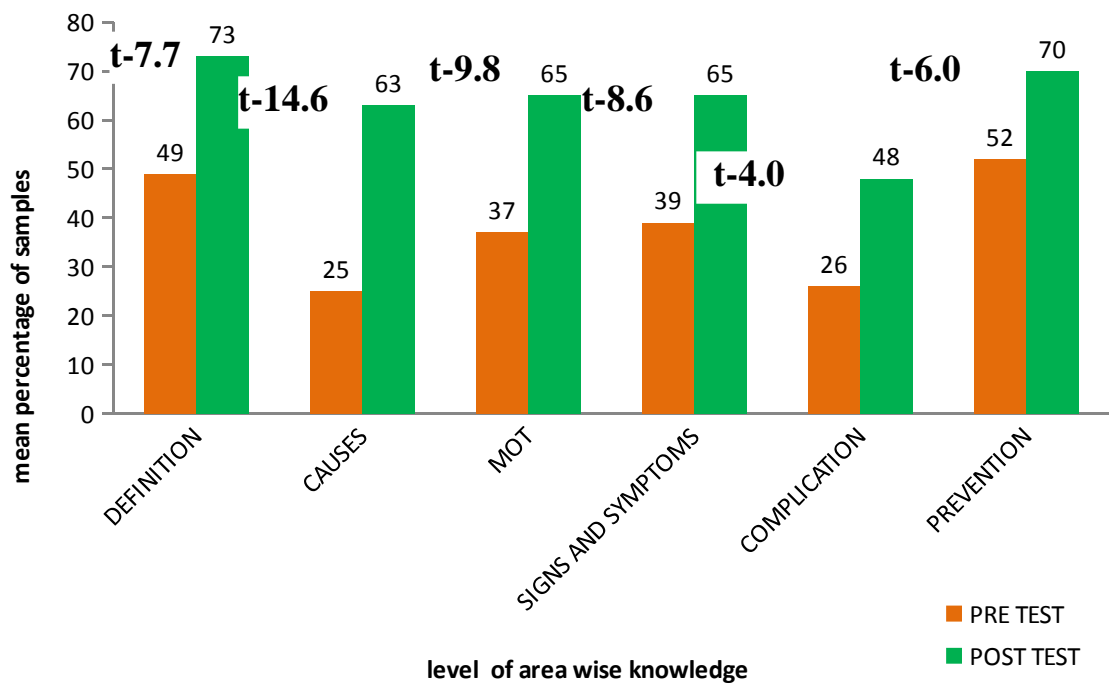


Fig:3 Bar diagram shows mean percentage of pre- test and post- test knowledge score of definition, causes, mode of transmission, signs and symptoms, complication and prevention on control and prevention of dengue fever among Housewife.

SECTION - C

Analysis and Comparison between pre test and post test practice on control and Prevention of Dengue fever among Housewife.

TABLE - 10

Analysis between pre test and post test level of practice score on control and prevention of dengue fever among Housewife

N=50

| PRACTICE | INADEQUATE | | MODERATELY ADEQUATE | | ADEQUATE | |
|-----------|------------|-----|---------------------|-----|----------|-----|
| Pre test | 32 | 64% | 15 | 30% | 3 | 6% |
| Post test | - | - | 10 | 20% | 40 | 80% |

Table 10 shows that, among 50 samples in pre test, 3(6%) samples had adequate practice, 15 (30%) had moderate practice and 32 samples (64%) had inadequate practice regarding control and prevention of dengue fever.

In post test, 40 (80%) samples had adequate practice, 10 (20%) had moderate practice and no samples had inadequate practice regarding control and prevention of dengue fever.

The above score was interpreted by fixing the scale of above 70% as adequate, 51-70% as moderate and below 50% as inadequate practice.

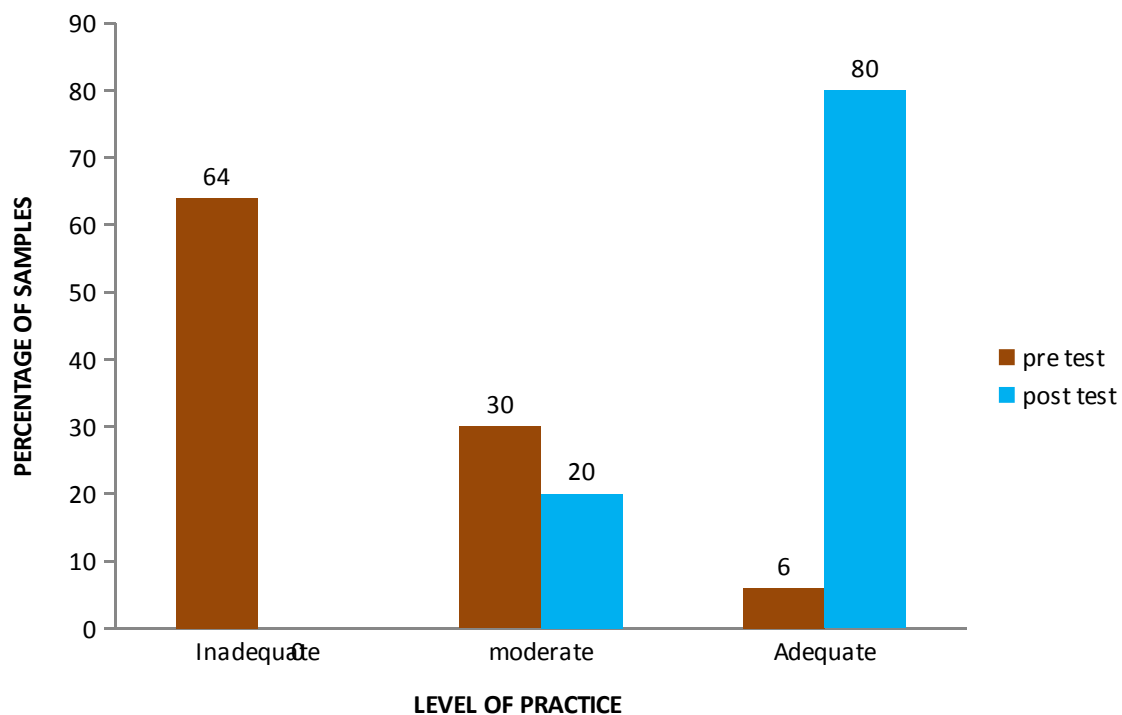


Fig: 5 Bar diagram shows percentage of pre- test and post- test practice score on control and prevention of dengue fever among Housewife.

TABLE: 11

Comparison of mean, standard deviation and 't' test scores of Housewife in pre and post test practice score regarding control and prevention of Dengue fever among Housewife

N=50

| PRACTICE | MEAN SCORE | MEAN | MEAN % | STANDARD DEVIATION | 't' VALUE | TABLE VALUE |
|-----------|------------|------|--------|--------------------|-----------|-------------|
| Pre test | 20 | 9.8 | 49 | 2.6 | 16.2* | 2.02 |
| Post test | | 16.3 | 82 | 2.0 | | |

***Significant at $p > 0.05$ level**

Table 11 showed that the mean score of pre and post test practice were 9.8 and 16.3 respectively. The standard deviation of pre and post test was 2.6 and 2.0.

The calculated 't' value was 16.2 which was greater than the table value (16.2 > 2.02). It was significant at $p > 0.05$ level. So research hypothesis is accepted.

t – 16.2 (P>0.05)

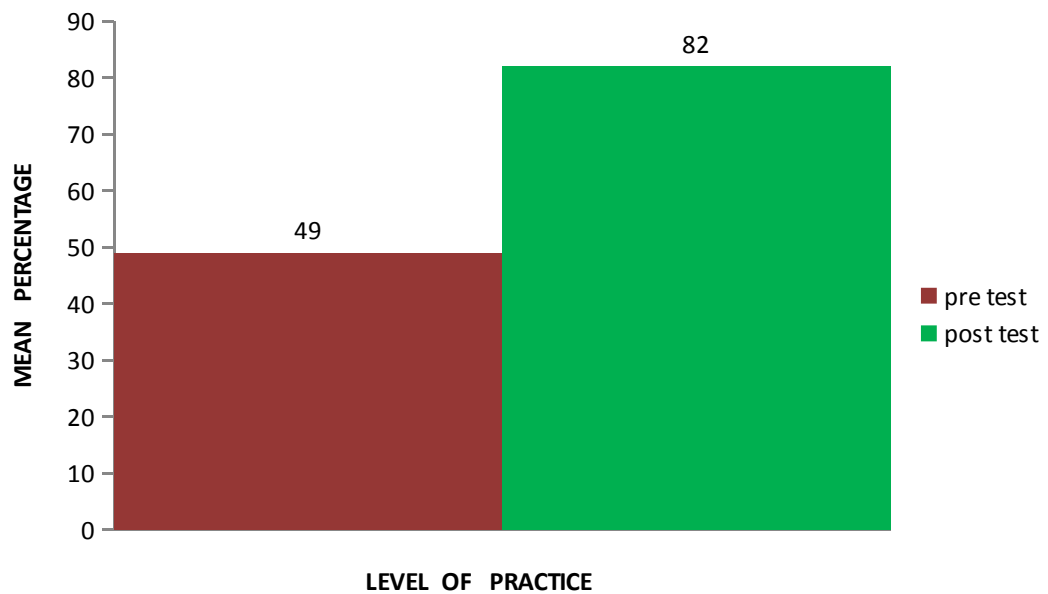


Fig: 6Bar diagram shows mean percentage of pre- test and post- test practice score on control and prevention of dengue fever among Housewife.

SECTION - D

Correlation between knowledge and practice regarding control and prevention of Dengue fever among Housewife

TABLE - 12

Correlation between knowledge and practice score regarding control and prevention of Dengue fever among Housewife.

| ASPECTS | MEAN | STANDARD DEVIATION | CORRELATION VALUE | TABLE VALUE | P VALUE |
|-----------|------|--------------------|-------------------|-------------|---------|
| Knowledge | 19.9 | 2.81 | 0.62 | 0.28 | p> 0.05 |
| Practice | 16.3 | 2.0 | | | |

Table 12 shows that, the obtained value $r=0.62$ is greater than the table value at 0.05 level of significance, which shows that there is a positive correlation between knowledge and practice of Housewife regarding control and prevention of Dengue fever. Higher the knowledge, better the practice.

So there is a correlation between knowledge and practice score of Housewife. The obtained correlation value of knowledge and practice was $r= 0.62$. Hence the research hypothesis is accepted.

SECTION-E

**Associations between post test score of knowledge and practice with
Demographic variables.**

TABLE -13

**Association between post test overall knowledge scores of samples with
Demographic Variables**

Chi-square computed between level of knowledge and demographic variables

N=50

| S. NO: | VARIABLE | CHI- SQUARE | 't' VALUE | d.f. | p-value |
|------------------------------------|---|------------------------|----------------------|-------------|----------------|
| 1. 1.1 1.2 1.3 1. 4 | Age of Houewive 26-30years 31-35 years 36-40 years Above 40 years | 8.73* | 7.82 | 3 | P> 0.05 |
| 2. 2.1 2.2 2.3 2. 4 | Educational status Illiterate School level Under graduate Post graduate | 9.52* | 7.82 | 3 | P>0.05 |
| 3. 3.1 3.2 3.3 3. 4 | Income Below Rs.2000 Rs.2001-3000 Rs.3001-4000 Above Rs.4000 | 8.08* | 7.82 | 3 | P>0.05 |
| 4. 4.1 4.2 4.3 4. 4 | Source of information Health personnel Friends Relatives Mass media | 10.72* | 7.82 | 3 | P>0.05 |
| 5. | Type of family | | | | P>0.05 |

| | | | | | |
|------------------------------------|---|-------|------|---|--------|
| 5.1 5.2 5.3 | Nuclear Joint Extended | 3.13 | 5.99 | 2 | |
| 6. 6.1 6.2 6.3 6. 4 | No. of persons in home One Two Three Four and above | 3.23 | 7.82 | 2 | P>0.05 |
| 7. 7.1 7.2 7.3 7. 4 | Type of house Hut Kutchha Pucca | 3.39 | 5.99 | 2 | P>0.05 |
| 8. 8.1 8.2 8.3 8. 4 | Type of drainage System Open drainage Closed drainage Kitchen garden Soakage pit | 1.0 | 7.82 | 3 | P>0.05 |
| 9. 9.1 9.2 9.3 9. 4 | Type of solid waste disposal Open dumping Throw into street Burning Collected by municipality | 8.39* | 7.82 | 3 | P>0.05 |

*Associated, d.f.-degree of freedom.

Chi-square values were calculated to associate the level of knowledge obtained through video teaching programme (table 13) with demographic variables.

In this above calculation, the demographic variables like Age ($8.73 > 7.82$) Educational status ($9.52 > 7.82$), Income ($8.08 > 7.82$), Source of information ($10.72 > 7.82$), Type of solid waste disposal ($8.39 > 7.82$) are associated as the calculated value is higher than table value.

Other variables like type of family ($3.13 < 5.99$), Number of persons in home ($3.23 < 7.82$), Type of house ($3.39 < 5.99$), Type of drainage ($1.0 < 7.82$) are not associated as the calculated value is less than the table value.

TABLE - 14

Association between post test practice scores of samples with demographic Variables

Chi-square computed between level of practice and demographic variables

N=50

| S. NO. | VARIABLE | CHI-SQUARE | 't' VALUE | d.f. | p-value |
|------------------------------------|---|-------------------|------------------|-------------|----------------|
| 1. 1.1 1.2 1.3 1. 4 | Age of Housewife 26-30years 31-35 years 36-40 years Above 40 years | 2.81 | 7.82 | 3 | P> 0.05 |
| 2. 2.1 2.2 2.3 2. 4 | Educational status Illiterate School level Under graduate Post graduate | 2.87 | 7.82 | 3 | P>0.05 |
| 3. 3.1 3.2 3.3 3. 4 | Income Below Rs.2000 Rs.2001-3000 Rs.3001-4000 Above Rs.4000 | 11.48* | 7.82 | 3 | P>0.05 |
| 4. 4.1 4.2 4.3 4. 4 | Source of information Health personnel Friends Relatives Mass media | 11.0* | 7.82 | 3 | P>0.05 |
| 5. 5.1 5.2 5.3 | Type of family Nuclear Joint Extended | 2.07 | 5.99 | 2 | P>0.05 |
| 6. 6.1 6.2 6.3 6. 4 | No. of persons in home One Two Three Four and above | 0.55 | 7.82 | 2 | P>0.05 |
| 7. | Type of house | 2.12 | 5.99 | 2 | P>0.05 |

| | | | | | |
|-----|------------------------------|-------|------|---|--------|
| 7.1 | Hut | | | | |
| 7.2 | Kutchra | | | | |
| 7.3 | Pacca | | | | |
| 8. | Type of drainage System | | | | |
| 8.1 | Open drainage | | | | |
| 8.2 | Closed drainage | | | | |
| 8.3 | Kitchen garden | | | | |
| 8.3 | Soakage pit | 0.45 | 7.82 | 3 | P>0.05 |
| 8. | | | | | |
| 4 | | | | | |
| 9. | Type of solid waste disposal | | | | |
| 9.1 | Open dumping | | | | |
| 9.2 | Throw into street | | | | |
| 9.3 | Burning | 8.76* | 7.82 | 3 | P>0.05 |
| 9. | Collected by municipality | | | | |
| 4 | | | | | |

*Associated, d.f.-degree of freedom

Chi-square values were calculated to associate the level of practice obtained through video teaching programme (table 14) with demographic variables.

In this above calculation, the demographic variables like Income (11.48>7.82), Source of information (11.0>7.82), Type of solid waste disposal (8.76>7.82), are associated as the calculated value is higher than the table value.

Other variables like Age (2.81<7.82), Educational status (2.87<7.82), Type of family (2.07<5.99), Number of persons in home (0.55<7.82), Type of house (2.12<5.99), Type of drainage system (0.45<7.82) are not associated as the calculated value is higher than the table value.

CHAPTER V

DISUCSSION

The study was conducted in olapalayam, rural area, Namakkal district. The aims of the study were to find out the effectiveness of video teaching programme on knowledge and practice regarding control and prevention of dengue fever among Housewife.

This chapter deals with the discussion of the findings in the study. The results are discussed under followings headings,

- ❖ To assess the pretest knowledge and practice regarding control and prevention of Dengue fever.
- ❖ To deliver the video teaching programme.
- ❖ To assess the post test knowledge and practice regarding control and prevention of Dengue fever
- ❖ To evaluate effectiveness of video teaching programme on knowledge and practices regarding control and prevention of Dengue fever.
- ❖ To find out the correlation between knowledge and practice regarding control and prevention of Dengue fever
- ❖ To find out the association between post test scores of knowledge and practice with demographic variables.

DEMOGRAPHIC VARIABLES:

In this present study, out of 50 Housewife, majority of them were from the age group of 26-30 years(36%),68% of Housewife were school level educated. 56% of Housewife belongs to above Rs. 4,000 of monthly income, 42% of Housewife were belongs to nuclear family,42% of Housewife were receiving information from mass media, 58% of housewife from four and above persons in home, 50% of Housewife are living in kutch house, 42% of Housewife are using open drainage and 58% of Housewife are disposing the solid waste through municipality.

The first objective of this study was to assess the pretest knowledge and practice regarding control and prevention of Dengue fever.

Knowledge:

In the pre test study, pre test knowledge level in Housewives regarding control and prevention on Dengue fever was inadequate. The knowledge level less than 50% in most of the aspects indicated that the Housewife had deficit knowledge regarding control and prevention of Dengue fever. The overall mean percentage of pretest knowledge score was 40%. The highest mean percentage was obtained in definition, and prevention. Remaining areas like causes, mode of transmission, signs and symptoms, complication were less mean percentage score.

Practice:

Pretest practice score regarding control and prevention of Dengue fever among Housewife shows that, most of the Housewife had inadequate practice. The mean score percentage was 49%. The mean was 9.8 and standard deviation of pretest practice was 2.6.

The second objective of this study was to deliver the video teaching programme:

The samples were collected in one place and shown video teaching programme on control and prevention of Dengue fever. Sample size is 50, duration of video teaching is 20 minutes .At the end of the video teaching, the samples were clarified their doubts on control and prevention of Dengue fever.

The third objective of this study was to assess the post test knowledge and practice regarding control and prevention of Dengue fever.

Post test Knowledge:

The post test knowledge level in Housewives regarding control and prevention of Dengue fever was adequate. The overall posttest mean score was 66% was significantly higher than pretest score.

The post test mean percentage value regarding definition of Dengue fever was 73% which was significant.

The post test mean percentage value regarding causes of Dengue fever was 63% which was significant.

The post test mean percentage value regarding signs and symptoms of Dengue fever was 65% which was significant.

The post test mean percentage value regarding mode of transmission of Dengue fever was 65% which was significant.

The post test mean percentage value regarding complication of Dengue fever was 48% which was significant.

The post test mean percentage value regarding prevention of Dengue fever was 70% which was significant.

Post test practice:

Post test practice score regarding control and prevention of Dengue fever among Housewife was adequate. The post test means score percentage was 82% which was significantly higher than the pre test score.

Fourth objective of this study was to evaluate effectiveness of video teaching programme on knowledge and practices regarding control and prevention of Dengue fever.

Knowledge:

Comparison of pre and post test knowledge score of control and prevention of Dengue fever was done by using paired 't' test.

The overall post test knowledge score of control and prevention of Dengue fever among Housewife were adequate. They are gained knowledge regarding dengue fever. The calculated 't' value was 14.8 which was greater than the table value ($14.8 > 2.02$).

Area wise knowledge comparison:

The calculated 't' value regarding definition of Dengue fever was 7.7 which was greater than the table value ($7.7 > 2.02$). So it was significant at ($p > 0.05$) level

The calculated 't' value regarding causes of Dengue fever was 14.6 which was greater than the table value ($14.6 > 2.02$). So it was significant at ($p > 0.05$) level.

The calculated 't' value regarding mode of transmission of Dengue fever was 9.8 which was greater than the table value ($9.8 > 2.02$). So it was significant at ($p > 0.05$) level.

The calculated 't' value regarding signs and symptoms of Dengue fever was 8.6 which was greater than the table value ($8.6 > 2.02$). So it was significant at ($p > 0.05$) level.

The calculated 't' value regarding complication of Dengue fever was 4.0 which was greater than the table value ($4.0 > 2.02$). So it was significant at ($p > 0.05$) level.

The calculated 't' value regarding prevention of Dengue fever was 6.0 which was greater than the table value ($6.0 > 2.02$). So it was significant at ($p > 0.05$) level.

Practice:

Comparison of pre and post test practice score of control and prevention of Dengue fever was done by using paired 't' test.

The post test practice on control and prevention of Dengue fever among Housewives were adequate. They have improved practices regarding control and prevention of Dengue fever. Most of the Housewives are started to use mosquito repellents after video teaching programme. The calculated 't' value was 16.2 which was greater than the table value ($16.2 > 2.02$). So it was significant at ($p > 0.05$) level.

The fifth objective of this study was to find out the correlation between knowledge and practice on control and prevention of Dengue fever among Housewives.

The present study revealed a positive correlation between knowledge and practice $r' = 0.62$. The table value is $r' = 0.28$. So it was noted that the Housewives with knowledge of the disease reported a significantly higher use of preventive measures.

The sixth objective of this study was to find out the association between post test scores of knowledge and practice on control and prevention of Dengue fever with demographic variables.

In this study the association was analyzed by using chi-square between post test level of knowledge and practice on control and prevention of Dengue fever among Housewife with demographic variables.

Knowledge:

The present study revealed a significant association of knowledge with demographic variables.

The demographic variables like age ($8.73 > 7.82$) Educational status ($9.52 > 7.82$), Income ($8.08 > 7.82$), Source of information ($10.72 > 7.82$), Type of solid waste disposal ($8.39 > 7.82$) are associated as the calculated value is higher than table value.

Other variables like type of family ($3.13 < 5.99$), Number of persons in home ($3.23 < 7.82$), Type of house ($3.39 < 5.99$), Type of drainage ($1.03 < 7.82$) are not associated as the calculated value is less than the table value.

Practice:

Chi-square values were calculated to associate the level of practice obtained through the video teaching programme with demographic variables. The demographic variables like Income ($11.48 > 7.82$), Source of information ($11.0 > 7.82$), Type of solid waste disposal ($8.76 > 7.82$), are associated as the calculated value is higher than the table value.

Other variables like Age ($2.81 < 7.82$), Educational status ($2.87 < 7.82$), Type of family ($2.07 < 5.99$), Number of persons in home ($0.55 < 7.82$), Type of house ($2.12 < 5.99$), Type of drainage system ($0.45 < 7.82$) are not associated as the calculated value is higher than the table value..

CHAPTER VI

SUMMARY, IMPLICATION, CONCLUSION, RECOMMENDATION AND LIMITATION

SUMMARY OFN THE STUDY:

The study was done to assess the effectiveness of video teaching Programme on knowledge and practice regarding control and prevention of Dengue fever among Housewife.

The researcher design used for the study was (only pretest post test design) Quasi experimental design. The approach used in this research was Evaluative Approach and study conducted in olapalayam rural area, Namakkal district. The conceptual frame work used in this study was based on Rosentock's Health Belief model (1974), was chosen for creating awareness and to change behavior to adopt preventive practice among samples regarding control and prevention of Dengue fever.

The test retest method was used to find out the reliability of the structured questionnaire for knowledge. The correlation was calculated between test and retest values to find out reliability of the questionnaire. The calculated value is $r'=0.92$ which is significant ($0.92>0.6$). This indicates that the questionnaire is reliable to use in this study. The reliability of the observational check list was done by adopting inter-rater method, the value was found to be 0.9. Hence the observational check list was found to be reliable.

The pilot study was conducted prior to the actual study to assess the feasibility for conducting study. 5 samples who met criteria were selected for pilot study. Demographic data was collected from the samples. A pretest was done with structured questionnaire for knowledge and observation check list for practice Video teaching programme on control and prevention of Dengue fever was implemented. Post test knowledge and practice was assessed for the samples. The data analysis was done by calculating the pretest and post test values and results shows that mean post test

knowledge and practice on control and prevention of Dengue fever was higher than the mean pretest knowledge and practice score. The calculated 't' value for knowledge ($14.8 > 2.02$), practice ($16.2 > 2.02$) which was significant.

The 50 samples of Housewife who met the criteria were selected for the study by using non-probability convenience sampling technique.

The instrument used for the data collection consists of 3 parts.

PART I: Demographic variables such as age, education. income, source of information, type of house, number of person in home, type of family, type of drainage system, type of solid waste disposal.

PART II: Structured interview questionnaire was used to assess the knowledge on control and prevention of dengue fever.

PART III: Observational checklist was used to observe the practice on control and prevention of dengue fever.

The brief introduction was given about the study. Demographic data was collected from the samples. Pretest knowledge was assessed by structured interview questionnaire and practice by using checklist. Video teaching programme was given on control and prevention of Dengue fever. Post test knowledge and practice was assessed after 1 week. The data analyzed by using descriptive and inferential statistics. The mean post test knowledge and practice score was higher than the mean pretest knowledge and practice score that shows video teaching programme was effective in improving knowledge and practice on control and prevention of Dengue fever.

MAJOR FINDINGS OF THE STUDY:

The demographic variables like age ($8.73 > 7.82$) Educational status ($9.52 > 7.82$), Income ($8.08 > 7.82$), Source of information ($10.72 > 7.82$), Type of solid

waste disposal ($8.39 > 7.82$) were had associated with the improvement in the level of knowledge and the demographic variables like income ($11.48 > 7.82$), health information ($11.0 > 7.82$), type of solid waste disposal ($8.76 > 7.82$) were had association with the improvement of practice recording control and prevention of Dengue fever.

Pretest knowledge level was assessed among Housewife that resulted, mean was 12.14, standard deviation 3.4, the overall knowledge mean percentage was 40% that shows the Housewife were in inadequate knowledge.

Pretest level of practice score was inadequate, mean was 9.8, standard deviation was 2.6. The overall practice mean percentage was 49%.

Post test level of knowledge was assessed. It was about mean 19.9 and standard deviation 2.81. The overall knowledge mean percentage was 66% that shows adequate knowledge after video teaching programme.

Post test level of practice was assessed. It was about mean 16.3 and standard deviation 2.0. The overall practice mean percentage was 82% that shows adequate practice after video teaching programme.

Area wise calculation of knowledge level was assessed. The post test mean percentage for definition of Dengue fever 73%, causes of Dengue fever was 63%, mode of transmission of Dengue fever was 65%, signs & symptoms of Dengue fever was 65%, complication of Dengue fever was 48%, and prevention of Dengue fever was 70%.

Comparison of pre and post test level of knowledge was analyzed by using paired't test. Calculated 't' value was 14.8 ($14.8 > 2.02$) which was greater than table value. So it was significant at $p > 0.005$ level.

Comparison of pre and post test level of knowledge in area wise also analyzed by using paired't test. Calculated't value for definition of Dengue fever $7.7 > 2.02$, causes $14.6 > 2.02$, mode of transmission $9.8 > 2.02$, signs symptoms $8.6 > 2.02$, complication $4.0 > 2.02$, prevention of Dengue fever $6.0 > 2.02$. Hence all the areas of knowledge was greater than the table value. So it was significant at $p > 0.005$ level.

Correlation between knowledge and practice was done by using Karl Pearson's correlation method. The calculated r' value was $0.62 (0.62 > 0.28)$. The calculated r value was higher than the table value. So it was a positive correlation between knowledge and practice so knowledge of the disease reported a significant higher use of preventive measures on control and prevention of Dengue fever.

NURSING IMPLICATION:

The results of this study have scope on nursing practice, nursing education and nursing research.

NURSING PRACTICE:

The most important role of the nurse is to provide awareness to the public regarding control and prevention of dengue fever. The nurse plays an important role in disease prevention and health promotion. Several implications can be drawn from the present study for nursing practice. The health personnel have added responsibility in educating the public regarding disease prevention and help in maintenance of

health by modification of life styles. Health education conducted by the health personnel in the community helps in wider coverage of public and provide necessary information regarding dengue fever and its control and prevention by using video teaching. They are the correct person to educate the Housewife,there by they can understand and educate this to family members, from family members to neighbors and community.

NURSING EDUCATION:

The nursing curriculum should emphasize on imparting health information to community using different teaching methods. Nursing students should be educated on health promotion, disease prevention and early detection of disease. Every students should encourage in providing information to the clients and the community for which they have to be prepared properly.

NURSING RESEARCH:

Since dengue fever is the re-emerging disease of global concern, more resources should be allocated to do research on dengue fever and its preventive measures. There is a great need of nursing research in the areas of client education. Health related studies need to concentrate on behavior modifications of public by developing unique teaching programmes. Research on newer methods of teaching, focusing on people's interest community participation and cost- effectiveness are needed.

CONCLUSION

Based on the findings of the study the following conclusions were drawn;

The study reveals that there was a significant association between demographic variables in knowledge are Age, Educational status, income, Health information, Type of solid waste disposal and association between demographic variables in practice are Income, Source of information, Type of solid waste disposal in improving knowledge and practice regarding control and prevention of Dengue fever.

The existed knowledge and practice regarding control and prevention of Dengue fever was inadequate for majority of samples before a video teaching programme. After video teaching programme, the knowledge and practice regarding control and prevention of Dengue fever among Housewives were significantly increased.

RECOMMENDATIONS:

- ❖ This similar study can be replicated on large sample.
- ❖ A comparison study can be conducted between urban and rural communities (or) between two groups on knowledge and practice on control and prevention of Dengue fever.
- ❖ A comparative study can be conducted to determine the effectiveness of video reaching programme and structured self instruction teaching programme on control and prevention of Dengue fever.
- ❖ A similar study can be conducted among school students on control and prevention of Dengue fever.
- ❖ A structured teaching programme can be conducted on knowledge, attitude and practice regarding control and prevention of dengue fever.

LIMITATION:

- Study was conducted only on Housewife.
- The sample size was limited to 50.
- The study was limited to measure the knowledge and practice of Housewife regarding control and prevention of Dengue fever.
- Complete practices are not observed from the samples.

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APPENDIX I

LETTER SEEKING PERMISSION FOR RESEARCH STUDY

FROM

Mrs. P. KOWSALYA,
II Year M.Sc. Nursing (community Health nursing),
Sresakthimayeil Institute of Nursing and Research,
komarapalayam.

TO

The Principal,
Sresakthimayeil Institute of Nursing and Research,
Komarapalayam.

Respected Madam,

Sub: Requesting permission conducting research study in community area

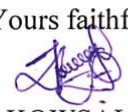
I, am II year M.sc.(N) student of Sresakthimayeil institute of nursing & research .I have undertaken the following research study to be submitted to **THE TAMILNADU DR.M. G. R. MEDICAL UNIVERSITY, CHENNAI** as a partial fulfillment of university requirement for degree in Master of Nursing.

Title: "A STUDY TO ASSESS THE EFFECTIVENESS OF VEDIO TEACHING PROGRAMME ON KNOWLEDGE AND PRACTICE REGARDING CONTROL AND PREVENTION OF DENGUE FEVER AMONG HOUSEWIVE IN SELECTED RURAL AREA AT NAMAKKAL DISTRICT".

With regard to this, I request you to allow me to conduct my research in community area

Thanking you in anticipation.


**PRINCIPAL
SRESAKTHIMAYEIL INSTITUTE OF
NURSING AND RESEARCH
KOMARAPALAYAM - 638 183.**

Yours faithfully,

(P. KOWSALYA)

APPENDIX II

**LETTER REQUESTING OPINION & SUGGESTIONS OF EXPERTS
FOR CONTENT VALIDITY OF TOOL**

From

II year M.Sc.(N)., (Community Health Nursing),
Sresakthimayeil Institute of Nursing & Research,
(J.K.K.Nattraja Educational Institution),
Kumarapalayam

To

Through: The Principal

Respected Sir/Madam,

SUB: Content validity-Requesting-valuable opinion & suggestions-regarding

I am a final year M.Sc. (N) student of Sresakthimayeil Institute of Nursing & Research (J.K.K.Nattraja Educational Institution), Kumarapalayam. In partial fulfillment of M.Sc (N) programme, I have selected the topic mentioned below for the research project which has to be submitted to the Tamil Nadu Dr.M.G.R. Medical University.

Hereby I have enclosed the tool on DENGUE FEVER, Hence I request to validate the tool & give your valuable opinion & suggestions for necessary modification of the same.

“A Study to assess the Effectiveness of Video Teaching Programme on Knowledge and Practice regarding Control and Prevention of Dengue Fever Among Housewife in Selected Rural Area At Namakkal District”.

Thanking you in anticipation

Yours faithfully

Encl: Tool

APPENDIX III
CONTENT VALIDITY CERTIFICATE

Name:

Designation:

Name of the college:

I hereby certify that I have validated the tool of 301227451 II year M.Sc (N) student of Community Health Nursing Department who is undertaking dissertation on A STUDY TO ASSESS THE EFFECTIVENESS OF VIDEO TEACHING PROGRAMME ON KNOWLEDGE AND PRACTICE REGARDING CONTROL AND PREVENTION OF DENGUE FEVER AMONG HOUSEWIVE IN SELECTED RURAL AREA AT NAMAKKAL DISTRICT.

Place:

Signature of the expert:

Date:

Designation:

LETTER FOR VALIDATION OF ENGLISH VERSION

From
Mrs. P. Kowsalya,
II Year M.Sc.,(Nursing) student,
Community Health Nursing Department,
Sresakthimayeil Institute of Nursing & Research,
(J.K.K.Nattraja Educational Institutions),
Komarapalayam – 638 183.

To

Mrs. UMA Madam, B.A., M.A., Ph.D.,
Associate Professor,
Department of English,
J.K.K. Nattraja College of Engineering & Technology.


Respected Sir / Madam,

Sub.: Request – Mrs. Kowsalya, II Year M.Sc.,(N) – Validation of English
Version for the Topic on Knowledge regarding Control & Prevention of Dengue
Fever among House wives – Reg.

I am II Year M.Sc.,(N) student of Sresakthimayeil Institute of Nursing & Research, (J.K.K.Nattraja Educational Institutions), Komarapalayam. For the partial fulfillment of The Tamil Nadu Dr. M.G.R. Medical University requirement, I have chosen the topic : “A STUDY TO ASSESS THE EFFECTIVENESS OF VIDEO TEACHING PROGRAMME ON KNOWLEDGE REGARDING CONTROL AND PREVENTION OF DENGUE FEVER AMONG HOUSE WIVES AT SELECTED RURAL AREA IN NAMAKKAL DISTRICT”. I kindly request you to validate the English version tool on CONTROL AND PREVENTION OF DENGUE FEVER which I have chosen for my studies. Hence, I request you to do the needful.

Thanking you

Yours faithfully,


P.K.UMA . B.A, M.A, M.Phil, Ph.D.
Dept of English
Associate professor.
J.K.K.Nattraja College of Engineering & Technology.



LETTER FOR VALIDATION OF TAMIL VERSION

From
Mrs. P. Kowsalya,
II Year M.Sc.,(Nursing) student,
Community Health Nursing Department,
Sresakthimayeil Institute of Nursing & Research,
(J.K.K.Nattraja Educational Institutions),
Komarapalayam – 638 183.

To
MR. DR. K. ESAKKI., Ph.D.,
Department of Tamil,
Asst. Professor,

Respected Sir / Madam,

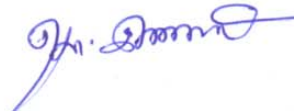
Sub.: Request – Mrs. Kowsalya, II Year M.Sc.,(N) – Validation of Tamil
Version for the Topic on Knowledge regarding Control & Prevention of Dengue
Fever among House wives – Reg.

I am II Year M.Sc.,(N) student of Sresakthimayeil Institute of Nursing & Research,
(J.K.K.Nattraja Educational Institutions), Komarapalayam. For the partial fulfillment of The Tamil Nadu
Dr. M.G.R. Medical University requirement, I have chosen the topic : “A STUDY TO ASSESS THE
EFFECTIVENESS OF VIDEO TEACHING PROGRAMME ON KNOWLEDGE REGARDING
CONTROL AND PREVENTION OF DENGUE FEVER AMONG HOUSE WIVES AT SELECTED
RURAL AREA IN NAMAKKAL DISTRICT”. I kindly request you to validate the Tamil version tool on
CONTROL AND PREVENTION OF DENGUE FEVER which I have chosen for my studies. Hence,
I request you to do the needful.

Thanking you

Yours faithfully,

Dr. K. ESAKKI
Asst. Prof in Tamil
J.K.K. Nattraja College of Arts and Science
Komarapalayam



ANNEXURE – IV
LIST OF EXPERTS VALIDATED THE TOOL

- 1. Dr.J.PRIYA, M.B.B.S., M.D.,**
Civil surgeon,
Erode Government head quarters Hospital,
Erode.
- 2. Dr.RAVI , M.B.B.S.,DC.H.,**
Paediatrician,
Baby clinic
kumarapalayam.
- 3. Mrs. M. AROKIAMARY , M.Sc (N).,**
Reader,
Department Of Community Heath Nursing,
Sresakthimayeil institute of nursing and research,
kumarapalayam.
- 4. Prof.Mrs.B. KAVAITHA, M.Sc (N).,**
Professor,
Department of community health nursing
Kongu College of Nursing,
Coimbatore.
- 5. Mrs.S. THANGAMUNEE SWARI, M.Sc (N).,**
Associate professor,
Department of community health nursing
Kongu College of Nursing,
Coimbatore.

APPENDIX-V

STRUCTURED INTERVIEW GUIDE ON KNOWLEDGE AND PRACTICE REGARDING CONTROL AND PREVENTION OF DENGUE FEVER

TOOL-I DESCRIPTION OF DEMOGRAPHIC VARIABLES FOR HOUSEWIFE

Instruction:

Dear samples you are requested to give some information about yourself. The responses given by you will be encoded by the researcher, the information will be kept confidential and it will be used only for the research purpose.

Sample No:

- 1) Age of house wive in years
 - a) 26-30 years
 - b) 31-35 years
 - c) 36-40 years []
 - d) above 40 years
- 2) Educational status of house wive
 - a) Illiterate
 - b) School level
 - c) Under graduate []
 - d) Post graduate
- 3) Monthly income of the family
 - a) Below Rs.2000
 - b) Rs. 2001 -3000
 - c) Rs.3001-4000 []
 - d) Above Rs. 4000
- 4) Source of information (Health information)
 - a) Health Personal
 - b) Friends
 - c) Relatives []
 - d) Mass Media
- 5) Types of family

- a) Nuclear
 - b) Joint
 - c) Extended
- []
- 6) Total number of persons in home
 - a) One
 - b) Two
 - c) Three
 - d) Four & Above
- []
- 7) Type of the house
 - a) Hut
 - b) Kutcha
 - c) Pucca
- []
- 8) Type of drainage system
 - a) Open drainage
 - b) Closed drainage
 - c) Kitchen garden
 - d) Soakage pit
- []
- 9) Type of Solid waste disposal
 - a) Open dumping
 - b) Throw into street
 - c) Burning
 - d) Collect by municipality
- []

TOOL- II

STRUCTURED INTERVIEW QUESTIONNAIRE TO ASSESS THE KNOWLEDGE ON PREVENTION OF DENGUE FEVER

Samp

le No:

Instruction:

The researcher will ask questions and tick the options according to the response of the subject.

- This tool consist of 30 questions
- For each questions 4 answers are given.
- Among the 4 options one will be the correct answer
- Each correct answer will carry one mark
- Answer will be used only for research purpose and will be kept confidential.

Knowledge regarding meaning of dengue fever

- 1) What is dengue fever?
 - (a) Water borne disease
 - (b) Vector (Mosquito) borne disease
 - (c) Air borne disease []
 - (d) Zoonotic disease

- 2) What is the other name for dengue fever?
 - (a) Yellow fever
 - (b) Typhoid fever
 - (c) Break borne fever []
 - (d) Malaria fever

Knowledge regarding causes and risk factors of dengue fever

- 3) Which infective agent is responsible for dengue fever?
(a) Virus
(b) Bacteria
(c) Fungus []
(d) Protozoa
- 4) Which species of mosquito can carry the dengue fever?
(a) Female Anopheles
(b) Female Aedes
(c) Male Aedes []
(d) Male Anopheles
- 5) How does Aedes mosquito looks like?
(a) Big mosquito
(b) Small mosquito
(c) Black mosquito with white strips []
(d) Black mosquito with green stripes
- 6) Which age group is commonly affected by dengue fever?
(a) Old age
(b) Adult
(c) Children []
(d) All the age group
- 7) In which season dengue fever is more prevalent?
(a) Summer season
(b) Rainy season
(c) Winter season []
(d) Post rainy season
- 8) In which water the Aedes mosquito commonly breed?
(a) Clean and storage water
(b) Drainage water
(c) Dirty water []
(d) Rain water

Knowledge regarding mode of transmission of dengue fever

- 9) How is dengue fever spread?
(a) By human to human contact
(b) By mosquito bite
(c) By unhygienic habits []
(d) By eating unhealthy

- 10) When does the dengue mosquito usually bites?
(a) Morning time
(b) Day time
(c) Evening time []
(d) Night time
- 11) When the Aedes mosquito is infected with dengue fever?
(a) After biting a person infected with dengue virus
(b) After fertilization
(c) After laying eggs []
(d) Before laying eggs
- 12) When the dengue virus is transmitted?
(a) When you come into physical contact with the infected Aedes mosquito
(b) During the feeding process
(c) When you come into physical contact with a dengue patient []
(d) By eating contaminated food.

Knowledge regarding signs and symptoms of dengue fever

- 13) Dengue fever incubation period ranges from
(a) 2-7 days
(b) 5-10 days
(c) 4-8 days []
(d) 3-9 days
- 14) Dengue is characterized by?
(a) Fever without rash
(b) Fever with rash
(c) Rash without fever []
(d) Neither fever nor rash
- 15) What are the initial signs and symptoms of dengue fever?
(a) High fever, joint pain, headache
(b) Fever, vomiting, diarrhea
(c) Fever, ear pain, abdominal distention []
(d) Fever, eye pain, indigestion
- 16) Which of the following is a symptom of dengue fever?
(a) Coughing up blood
(b) Hallucination
(c) High fever []
(d) Increased stress
- 17) What are the signs and symptoms of dengue haemorrhagic fever?

- (a) Bleeding from nose, teeth, gums and under the skin
- (b) Ulcer
- (c) Decreased blood pressure []
- (d) Anemia

- 18) What is the test to conform dengue fever?
- (a) Urine test
 - (b) Blood test
 - (c) Sputum test []
 - (d) Stool test

Knowledge regarding complications of dengue fever

- 19) What is the complication of dengue fever?
- (a) Shock
 - (b)) Inflammation of spleen
 - (c) Inflammation of stomach []
 - (d) Inflammation of gallbladder
- 20) Why bleeding occurs to a dengue affected person?
- (a) A decrease in platelet levels
 - (b) Repeated falls
 - (c) Eating spicy foods []
 - (d) A decrease white blood cells

Knowledge regarding management and prevention of dengue fever

- 21) What will you do if there is a person affected with dengue fever in your area?
- (a) Keep the affected person at home itself
 - (b) Advice to take self medication
 - (c) Report to the health personnel without delay []
 - (d) Advice to take rest
- 22) What is the preventive measure for dengue fever?
- (a) Periodical medical checkup
 - (b) Eating healthy foods
 - (c) Prevention of Aedes mosquito breeding and bite []
 - (c) Vaccination
- 23) How can you prevent the spread of dengue fever?
- (a) Wearing face – masks
 - (b) Do not have any physical contact with other people
 - (c) Covering the mouth when you cough (or) sneeze []
 - (d) Clearing stagnant water

- 24) How will you protect from Aedes mosquito bite?
 (a) Keep the door and windows open
 (b) Cover the mouth and nose
 (c) Wear cotton cloth []
 (d) Use mosquito coil/liquid/net
- 25) How will you prevent spread of Dengue infection from an infected person
 (a) Protect the client from Aedes mosquito bite
 (b) Protect the client from contact with others
 (c) Keep the client in a separate room []
 (d) No need of preventive measures
- 26) Which type of diet will be given to dengue fever client
 (a) Bland diet
 (b) Spicy food
 (c) Normal diet with plenty of oral fluids []
 (d) Balanced diet
- 27) What will you do to reduce fever at home
 (a) Over wrap the client
 (b) Provide oral fluids
 (c) Separate the client []
 (d) Give paracetamol tablet with tepid sponge
- 28) Which of the following is used to kill mosquito larvae in water
 (a) Paris green abate solution
 (b) Chlorine
 (c) Bleaching powder []
 (d) Iodine
- 29) Where the chances are high for the water stagnation ?
 (a) Coconut shell
 (b) Discarded tyre
 (c) Broken pot and bottles []
 (d) All the above
- 30) How to protect the storage water at home?
 (a) Cover with lid
 (b) Water kept in open pot
 (c) Usage of well water []
 (d) Usage of dirty / Unfiltered water

Interpretation

Each correct answer carries one mark.

Below 50% - Inadequate knowledge (0-15 questions)

51 – 70 % - Moderate knowledge (16-21 questions)

Above 70% - Adequate knowledge (22-30 questions)

TOOL-III: CHECKLIST TO ASSESS THE PRACTICES ON PREVENTION OF DENGUE FEVER

Instruction:

They will interview and observe the practices for prevention of dengue fever and tick the option according to the practice researcher

| Sl. NO | Content | Yes | No |
|-------------------|---|------------|-----------|
| | PART – A: INTERVIEW QUESTIONS | | |
| 1. | Do you clean the water storing vessels atleast once a week? | | |
| 2. | Do you empty the water collected in the discarded items such as tyres, coconut shells, broken bottles pots, plastic covers and bags ? | | |
| 3. | Do you clear the water stagnated in pits around the house? | | |
| 4. | Do you change the water in the flower vase and air cooler at least once a week? | | |
| 5. | Do you keep the grinding stone and pet animal feeding container free from water collection? | | |
| 6. | Do you clean the water tank at least thrice a month ? | | |
| 7. | Do you use mosquito net/coil/liquidator ? | | |
| 8. | Do you use the larvicides to kill mosquito larvae (or) by the municipality periodically? | | |
| 9. | Do you store water in fully covered container? | | |
| 10. | Don't you have mosquito breeding sites around the house? | | |
| 11. | Do you following proper method of solid waste disposal? | | |
| 12. | Do you have closed drainage system/kitchen garden? | | |

| | | | |
|------|---|--|--|
| 13. | Do you maintaining hygiene in and around house? | | |
| | PART – B : OBSERVATIONAL PRACTICES | | |
| | Environment is free from | | |
| 14. | Water stagnation | | |
| 15. | Discarded items like tyre, coconut shell,broken pot and bottle,plastic cover,pet animal feeding plate,cups. | | |
| 16. | Grinding stone. | | |
| 17.. | Stores water in covered vessels. | | |
| 18. | Water tank/reservoir covered with lid. | | |
| 19. | Stored water is free from larvae. | | |
| 20. | Windows covered with mosquito mesh /net. | | |

Interpretation

Each correct answer carries one mark.

Below 50% - Inadequate practice(0-10 questions)
51 – 70 % - Moderate practice (11-14 questions)
Above70% - Adequate practice (15-20 questions)

APPENDIX VI
SCORING KEY

| S.NO | Correct answer | Scoring |
|-------------|-----------------------|----------------|
| 1 | b | 1 |
| 2 | c | 1 |
| 3 | a | 1 |
| 4 | b | 1 |
| 5 | c | 1 |
| 6 | c | 1 |
| 7 | d | 1 |
| 8 | a | 1 |
| 9 | b | 1 |
| 10 | b | 1 |
| 11 | a | 1 |
| 12 | a | 1 |
| 13 | a | 1 |
| 14 | b | 1 |
| 15 | a | 1 |
| 16 | c | 1 |
| 17 | a | 1 |
| 18 | b | 1 |
| 19 | a | 1 |
| 20 | a | 1 |
| 21 | c | 1 |
| 22 | c | 1 |
| 23 | d | 1 |
| 24 | d | 1 |
| 25 | a | 1 |
| 26 | c | 1 |
| 27 | d | 1 |
| 28 | a | 1 |
| 29 | d | 1 |
| 30 | a | 1 |

APPENDIX- VII

PLANNED VIDEO TEACHING ON CONTROL AND PREVENTION OF DENGUE FEVER

| | |
|-----------------------------|--|
| Name of the student teacher | : P.Kowsalya |
| Topic | : Control & Prevention of Dengue Fever |
| Group | : Housewife in selected area |
| Group Size | : 50 Housewife |
| Place | : olapalayam |
| Method of teaching | : Lecturer Cum discussion |
| A.V Aids | : Video |
| Duration | : 45 Minutes |
| Medium of Instruction | : Tamil |

General Objectives

At the end of teaching the housewife will gain adequate knowledge and demonstrate desirable practice effectively for prevention of dengue fever in their home and surrounding environment.

Specific Objectives

Housewife will be able to

- Define dengue fever
- Explain about special characteristics of Aedes mosquito.
- Discuss about epidemiological features.
- Explain about mode of transmission.
- Enumerate the life cycle of mosquito.
- Explain about incubation period.
- List down the clinical features of dengue fever?
- List out the laboratory test of dengue fever?
- Explain about management and preventive.
- Enlist the complications of dengue fever.

| ➤ Time | ➤ Specific Objective | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V aids | ➤ Evaluation |
|--------|---|--|---|---|--|
| ➤ | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ Housewives will be able to define dengue fever. | ➤ INTRODUCTION ➤ Dengue fever is one of the most important emerging disease of the tropical and subtropical regions, affecting urban and peri-urban areas. In India, the risk of dengue is dramatically increased in recent years due to rapid urbanization, lifestyle changes and deficient water management. Improper water storage practice, in urban, peri-urban and rural areas lead to proliferation of mosquito breeding sites. ➤ ➤ DEFINITIONS ➤ Dengue is an infection caused by dengue virus, which is spread in human beings by aedes aegypti and aedes albopictus mosquitoes. The fever caused by dengue is called dengue fever. ➤ It is also called as “break bone fever”. It is | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ Teacher: Defining about dengue fever ➤ Learner: Listening | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ Video | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ What is meant by dengue fever. |

| | | | | | |
|--------|--|--|--|---|--|
| | | characterized by sudden high fever. Severe headache, pain behind the eyes and in muscles and joints. | | | |
| ➤ Time | ➤ Specific Objective | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V aids | ➤ Evaluation |
| ➤ | ➤ Housewives will be able to explain about special characteristic of Aedes mosquito ➤ ➤ ➤ ➤ ➤ Housewives will | ➤ SPECIFIC CHARACTERISTICS OF AEDES MOSQUITOE: ➤ Aedes mosquito looks like black colour and white stripes marking on their body and legs. ➤ It can fly maximum 100-200 meters per day. ➤ They are more found in tropical and subtropical regions. ➤ It can breed only in fresh stagnant water and rain water. ➤ They typically bite during the day, particularly in the early morning and in the evening. ➤ In India and America due to overloading, improper water storage practice and poor sanitation. ➤ ➤ EPIDERMIOLOGICAL FEATURES: ➤ Agent ➤ Dengue is caused by group 'b' arbovirus and the virus has four distinct antigenic serotypes 1,2,3 and 4 & is transmitted by certain species of Aedes mosquitoes i.e. Aedes aegypti and Aedes albopictus. | ➤ Teacher: Explain about special characteristic of Aedes mosquito ➤ Learner: Listening ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ | ➤ Video ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ | ➤ What are special characteristics of Aedes mosquito ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ |

| | | | | | |
|------------------------------|--|---|--|--|---|
| | be able to discuss about epidemiological features. | | ➤ ➤ | ➤ | ➤ ➤ |
| ➤ T i m e | ➤ Specific Objective | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V a i d s | ➤ Evalu ation |
| ➤ | ➤ | ➤ Host: ➤ Age ➤ It can occur at any age but it is very common among children under the age of 15 years due to low immunity against disease. It can also affect old age people. ➤ ➤ Gender ➤ It affects both the gender. ➤ Immunity ➤ It affects no previous immunity person. ➤ ➤ Environment: ➤ Season (Post Rainy Season) ➤ It is present all the time. But it is very common during rainy season due to water stagnation and | ➤ Teacher: ➤ Discuss about epidemiological features | ➤ V i d e o | ➤ What are the causative factor for dengue fever? |

| | | | | | | | | | | | | | | | | | | | | | | | | | | | |
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| | | <p>collection of water in discarded items. So it is more common in post rainy season.</p> <p>➤</p> <p>➤ Breeding Sources</p> <p>➤ Aedes mosquito breed in small collection of fresh water in discarded container such as disposal tea cups, coconut shells, old tyres</p> <p>➤ And grinding stone, open water tanks, unclosed vessels and utensils</p> | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ T i m e | ➤ Specific Objecti ve | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V ai d s | ➤ Evalu ation | | | | | | | | | | | | | | | | | | | | | | |
| ➤ | ➤ | <p>➤ Aedes mosquito breed in small collection water</p> <table><tr><td>➤ Artificial</td><td>Natural</td></tr><tr><td>➤ →grinding stones</td><td>→Trees holes</td></tr><tr><td>➤ → Coconut shells</td><td>→Bamboo stumps</td></tr><tr><td>➤ →Discarded items</td><td>→Leaf axils and faller leaves</td></tr><tr><td>➤ Tea cups, tumbler,</td><td>→Ground depression</td></tr><tr><td>➤ plastic bags, cans, tins,</td><td>→ Gardens</td></tr><tr><td>➤ broken pots/bottles.</td><td></td></tr><tr><td>➤</td><td></td></tr><tr><td>➤ →Old discarded tiers</td><td></td></tr><tr><td>➤ →Flower pots/ vase.</td><td></td></tr><tr><td>➤ →Open water tank.</td><td></td></tr></table> | ➤ Artificial | Natural | ➤ →grinding stones | →Trees holes | ➤ → Coconut shells | →Bamboo stumps | ➤ →Discarded items | →Leaf axils and faller leaves | ➤ Tea cups, tumbler, | →Ground depression | ➤ plastic bags, cans, tins, | → Gardens | ➤ broken pots/bottles. | | ➤ | | ➤ →Old discarded tiers | | ➤ →Flower pots/ vase. | | ➤ →Open water tank. | | ➤ | ➤ | ➤ |
| ➤ Artificial | Natural | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ →grinding stones | →Trees holes | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ → Coconut shells | →Bamboo stumps | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ →Discarded items | →Leaf axils and faller leaves | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ Tea cups, tumbler, | →Ground depression | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ plastic bags, cans, tins, | → Gardens | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ broken pots/bottles. | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ →Old discarded tiers | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ →Flower pots/ vase. | | | | | | | | | | | | | | | | | | | | | | | | | | | |
| ➤ →Open water tank. | | | | | | | | | | | | | | | | | | | | | | | | | | | |

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|------------------------------|--------------------------------------|--|---|---|--------------------------|
| | | <ul style="list-style-type: none"> ➤ →Uncovered water storage container ➤ →Water storage jars, basins, vessels. ➤ →Refrigerator / air coaler. ➤ ➤ | | | |
| ➤ T i m e | ➤ Specific Objecti ve | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V ai d s | ➤ Evalu ation |

| | | | | | |
|------------------------------|---|--|--|---|---|
| ➤ | ➤ Housewives will be able to explain about mode of transmission | ➤ MODE OF TRANSMISSION: ➤ Mosquito transmit dengue infection ➤ Transmission of the virus is by mosquitoes there are aedes aegypti and aedes albopictus. ➤ ➤ Commonly female aedes mosquito prefers blood as main food for reproduction. The male aedes mosquitoes are not transmitting the disease because they are vegetarian. They prefer only plant juices. ➤ ➤ Transmission Cycle ➤ Aedes mosquito biting and sucking the infected blood from a person and inject the same infective blood into the healthy person blood. In this way the dengue fever is transmitted from one person to another person. ➤ ➤ Infective Man-→Mosquitoe-→Healthy Man | ➤ Teacher: ➤ Explains about mode of transmission. ➤ Learner: Listening | ➤ ➤ ➤ ➤ ➤ V id e o | ➤ ➤ ➤ ➤ ➤ What are the route for transmission of dengue fever. ➤ |
| ➤ T i m e | ➤ Specific Objective | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V ai | ➤ Evaluation |

| | | | | | |
|------------------------------|--|---|---|---|---|
| | to explain about management of dengue fever. | <ul style="list-style-type: none"> ➤ →Dehydration ➤ →Hypotension ➤ ➤ MANAGEMENT OF DENGUE FEVER: ❖ The management of dengue fever is symptomatic and supportive. ❖ Provide adequate bed rest for patient with dengue fever. ❖ Instruct the infected person under the mosquito net to prevent spread of disease to others. | ent of dengue fever ➤ Learner: Listening | | for dengue fever |
| ➤ T i m e | ➤ Specific Objective | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V aids | ➤ Evaluation |
| ➤ | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ | ❖ Record the vital signs ❖ Give oral fluids like orange juices, tender coconut and ORS to prevent dehydration and maintain electrolyte balance. ❖ Antipyretics and tepid sponge can be provided to patient in home to control fever. ❖ In general, there is no need for fluid therapy more than 48 hours after onset of leakage and shock. ❖ Patient with any signs of bleeding should be admitted to hospital. ❖ Blood transfusion is indicated in case with profound | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ | ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ ➤ |

| | | | | | |
|---------------|--|--|--|--|---|
| | <ul style="list-style-type: none"> ➤ ➤ ➤ ➤ ➤ ➤ Housewives will be able to explain about prevention of dengue fever | <p>shock after initial fluid replacement.</p> <ul style="list-style-type: none"> ❖ Special ward is available in PHC and Government hospital for treatment of dengue fever. ➤ ➤ PREVENTION OF DENGUE FEVER: ➤ There is no vaccine against dengue fever, source reduction and protection against Aedes mosquito bite is the only way to prevent the transmission of disease. The mosquito rest indoors, in closet and other dark places outside they rest where it is cool and shady. The mosquito ➤ Lays eggs in clean water containers in and around the houses, schools and workplaces. | <ul style="list-style-type: none"> ➤ ➤ ➤ ➤ ➤ ➤ Teacher: Explain about prevention of dengue fever ➤ Learner: Listening | <ul style="list-style-type: none"> ➤ ➤ ➤ ➤ ➤ ➤ Video | <ul style="list-style-type: none"> ➤ ➤ ➤ ➤ ➤ ➤ What are the preventive measures for dengue fever? |
| ➤ Time | ➤ Specific Objective | ➤ Content | ➤ Teacher Learner Activity | ➤ A . V aids | ➤ Evaluation |
| ➤ | ➤ | <ul style="list-style-type: none"> ➤ Preventive Measures are ➤ Prevention of Aedes Mosquito Breeding ➔ Maintain proper housing and keep the environment free from rain water collection. ➔ Environment should be clean and get rid of water holding container such as old used tyres, discarded tins, | ➤ | ➤ | ➤ |

| | | | | | |
|------------------------------|--------------------------------------|---|---|---|--------------------------|
| | | <p>empty pats, broken bottles, coconut shells & plastic covers and bags.</p> <p>➔ Keep the grinding stone free from water collection turn it upside down (or) cover soil if not used.</p> <p>➔ Cover all water containers with cloth/lid including the content tubels, drums and vessels. This will prevent mosquitoes to lay eggs and there by prevent mosquito breeding.</p> <p>➔ Cover the water tank with lid and clean it periodically.</p> <p>➔ Change water in flower vases and bowls and keep flower pot plades dry to avoid the breeding of mosquitoes.</p> <p>➔ Remove unwanted grass around the house.</p> <p>➔ Poring of abate solution into clean water and water tank weekly once to kill mosquito larvae.</p> <p>➤</p> | | | |
| ➤ T i m e | ➤ Specific Objecti ve | <p>➤</p> <p>➤ Content</p> | ➤ Teacher Learner Activity | ➤ A . V ai d s | ➤ Evalu ation |
| ➤ | ➤ | <p>➤ Prevention of Aedes mosquito bite</p> <p>➔ Use herbal plant (Neem leaves, Tulsi leaves for fogging).</p> <p>➔ Use mosquito coils, electric liquid vapourizer electric bat during day time to prevent mosquito bite and use mosquito repellent cream on exposed body parts.</p> | ➤ | ➤ | ➤ |

| | | | | | |
|--|--|---|--|--|--|
| | | <ul style="list-style-type: none"> ➔ Close the doors and windows during early morning and evening. ➔ Use mosquito mesh for windows. ➔ Use mosquito net while sleeping. ➔ Small mosquito eating fish have also been used with some success. ➔ Wherever possible practicable and affordable, prevent entry of mosquito into the house by keeping wire mesh on windows and doors. ➔ Keep the surroundings of your house clean. ➤ ➤ ➤ CONCLUSION: ➤ Dengue is a vector borne viral disease. So it is a responsible of every individual in the community to get awareness of the dengue and to take necessary action for prevention and control of dengue fever. ➤ ➤ SUMMARY: ➤ Till now we have discussed about definition epidemiological factors, mode of transmission, signs and symptoms, diagnosis, management control and preventive measures of dengue fever. | | | |
|--|--|---|--|--|--|





➤ ANNEXURE – VIII

➤ tpdh njhFg;G

- இல்லத்தரசிகள் பற்றிய சுயவிபரம்
- **Fwpq;G:**
- **md;ghu;e;jjiytpfNs> eq;fisg; gw;wpa rpy jfty;fis mspf;FkhW Nfl;Lf; nfhs;fpNwd;. ePq;fs; mspf;Fk; jfty;fs; midj;Jk; Muha;r;rpahsu; Fwpj;Jf; nfhs;thu;. ePq;fs; mspf;Fk; jfty;fs; midj;Jk; ufrpakhfitt;fg;gLk; kw;Wk; .it midj;Jk; Muha;r;rp;fhf kl;LNk gad;gLj;jg;gLk;.**
- 1) இல்லத்தரசிகளின் வயது
- அ) 25-30 ஆண்டுகள்
- ஆ) 31-35 ஆண்டுகள்
- இ) 36-40 ஆண்டுகள் []
- ஈ) 40 ஆண்டுகளுக்கு மேல்
- 2) இல்லத்தரசிகளின் கல்வியறிவு
- அ) கல்வியறிவற்றவர்
- ஆ) பள்ளிக்கல்வி
- இ) []
- ஈ)
- 3) குடும்பத்தின் மாத வருமானம் (ரூபாய்)
- அ) 2000-க்கு கீழ்
- ஆ) 2001-3000
- இ) 3001-4000 []
- ஈ) 4000-க்கு மேல்
- 4) சுகாதார செய்திகள் கிடைக்கும் வழிமுறை
- அ) உடல் பரிசோதனையாளர்கள்

- ஆ) நண்பர்கள்
- இ) உறவினர்கள் []
- ஈ) ஊடகங்கள்
- 5) குடும்பத்தின் வகை
 - அ) தனிக்குடும்பம்
 - ஆ) கூட்டுக்குடும்பம் []
 - இ) விரிவாக்கப்பட்ட குடும்பம்
 -
- 6) tPl;by; cs;s egh;fspd; எண்ணிக்கை
 - அ) xd;W
 - ஆ) இரண்டு []
 - இ) மூன்று
 - <) ehd;F kw;Wk; mjw;F Nky;
 -
- 7) வீட்டின் வகை
 - அ) குடிசைவீடு
 - ஆ) ஓட்டுவீடு []
 - இ) மாடிவீடு
 -
- 8) கழிவுநீரை வெளியேற்றும் வகை
 - அ) திறந்த வெளியில்
 - ஆ) மூடிய வழியில்
 - இ) வீட்டுத்தோட்டத்தில் விடுதல் []
 - ஈ) குழியில் விடுதல்
 -

➤ 9) குப்பைகளை வெளியேற்றும் வகை

➤ அ) திறந்தவெளியில்

➤ ஆ) தெருவில் எறிதல்

➤ இ) எரித்தல்

[]

➤ ஈ) நகராட்சியின் மூலமாக

➤

➤

➤

➤ டெங்குகாய்ச்சல்பற்றியஅறிவைசோதிக்கும்வ

ழிகாட்டி

➤ fUtp – 2

➤

➤ nlq;F fha;r;ry; jLf;Fk; Kiwfs; gw;wpa mwpit

gq;Nfw;gtu;fsplk; tbtikf;fg;gl;l Nfs;tpfs; %yk; fz;lwpjy;

➤

➤ khjpup

vz::

➤ Fwpg;G:

➤ Muha;r;rpahsh; gpd;tUk; Nfs;tpfis gq;Nfw;gtu;fsplk;

Nfl;L mth;fspd; tpilfSf;F Vw;wthW (✓) bf; nra;thh;.

➤

• .jpy; nkhj;jk; 30 Nfs;tpfs; es;sd.

• xt;nthU Nfs;tpfSf;Fk; ehd;F tpilfs; es;sd. mjpy; xd;W kl;LNk
rhpahd tpilahFk;.

• xt;nthU rhpahd gjpy;fSf;Fk; xU kjpg;ngz; nfhLf;fg;gLk;.

• ePq;fs; mspf;Fk; gjpy;fs; midj;Jk; ufrpakhfTk;>

Muha;r;rpf;fhf kl;LNk gad;gLj;jg;gLk;.

➤

➤ டெங்கு காய்ச்சலின் பொருள்

➤

➤ 1) டெங்கு காய்ச்சல் என்றால் என்ன?

➤ அ) தண்ணீரின்மூலம் பரவும் நோய்

➤ ஆ) கொசுக்களின்மூலம் பரவும் நோய்

➤ இ) காற்றின்மூலம் பரவும் நோய்

[]

➤ ஈ) பூச்சிகளின்மூலம் பரவும் நோய்

➤

➤ 2) டெங்குகாய்ச்சலின் மறுபெயர் என்ன?

➤ அ) மஞ்சள் காய்ச்சல்

➤ ஆ) டைபாய்டு காய்ச்சல்

➤ இ) எலும்புமுறிவு காய்ச்சல்

[]

- ஈ) மலேரியா காய்ச்சல்
-
- டெங்கு காய்ச்சலுக்கான காரணிகள்
-
- 3) டெங்கு காய்ச்சலுக்கு காரணமான தொற்றுகிருமி எது?
 - அ) வைரஸ்
 - ஆ) பாக்டீரியா
 - இ) பூஞ்சைகள்
 - []
 - ஈ) ஓரணு உயிரி
 -
- 4) எந்த வகையான இனத்தைச் சார்ந்த கொசு டெங்குகாய்ச்சலைப் பரப்புகிறது?
 - அ) பெண் அனாக்பிலிஸ் கொசு
 - ஆ) பெண் ஏடிஸ் கொசு
 - இ) ஆண் ஏடிஸ் கொசு
 - []
 - ஈ) ஆண் அனாக்பிலிஸ் கொசு
 -
- 5) ஏடிஸ் கொசு எப்படி இருக்கும்?
 - அ) பெரியகொசு
 - ஆ) சிறியகொசு
 - இ) கருப்புகொசுவில் வெள்ளைவரிகள்
 - []
 - ஈ) கருப்பு கொசுவில் பச்சை வரிகள்
 -
- 6) பொதுவாக எந்த வயதினரை டெங்குகாய்ச்சல் பாதிக்கிறது?
 - அ) முதியவர்களை
 - ஆ) வயதுவந்தோரை
 - இ) குழந்தைகளை
 - []

- ஈ) எல்லாவயதினரையும்
-
- 7) எந்த பருவம் டெங்குகாய்ச்சலுக்கு சதகமாக காணப்படுகிறது?
 - அ) கோடைகால பருவத்தில்
 - ஆ) மழைகால பருவத்தில்
 - இ) குளிர்கால பருவத்தில்
 - []
 - ஈ) மழைகால பருவத்திற்கு பின்
- 8) டெங்குகாய்ச்சலை பரப்பும் ஏடிஸ் கொசு எந்த வகையான தண்ணீரில்
 - வளர்கிறது?
 - அ) சேமித்து வைத்துள்ள சுத்தமான தண்ணீர்
 - ஆ) வடிகால்நீர்
 - இ) அசுத்தமான தண்ணீர் [
 -]
 - ஈ) மழைநீர்
 -
- டெங்கு காய்ச்சல் பரவும் முறை
 -
- 9) டெங்கு காய்ச்சல் எப்படி பரவுகிறது?
 - அ) மனிதன் மூலமாக
 - ஆ) கொசுக்கடி மூலமாக
 - இ) சுகாதாரமற்ற பழக்கம் மூலமாக
 - []
 - ஈ) ஆரோக்கியமற்ற உணவுமுறை மூலமாக
 -
- 10) பொதுவாக ஏடிஸ் கொசு எப்பொழுது கடிக்கும்?
 - அ) காலையில்
 - ஆ) பிற்பகலில்
 - இ) மாலையில் [
 -]

- ஈ) இரவில்
-
- 11) ஏடிஸ் கொசு டெங்குவைரசால் எப்பொழுது பாதிக்கப்படுகிறது?
- அ) டெங்குவால் பாதிக்கப்பட்டவரை கடித்த பின்
- ஆ) இனப்பெருக்கத்தின் பின்
- இ) முட்டை இடுவதற்கு பின் [
-]
- ஈ) முட்டை இடுவதற்கு முன்
-
- 12) எப்போது டெங்கு வைரஸ் பரவுகிறது?
- அ) கொசுவின் தொடர்புமூலமாக
- ஆ) கொசு இரத்தத்தை உறிஞ்சும்போது
- இ) டெங்குவைரசால் பாதிக்கப்பட்டவரின் தொடர்பு [
-]
- ஈ) அசுத்தமான உணவு உட்கொள் த h ல்
- டெங்குகாய்ச்சலின் அறிகுறிகள்
- 13) டெங்குகாய்ச்சலின் அடைகாக்கும் காலம் எவ்வளவு?
- அ) 2-7 நாட்கள்
- ஆ) 5-10 நாட்கள்
- இ) 4-8 நாட்கள் [
-]
- ஈ) 3-9 நாட்கள்
- 14) டெங்குவின் பண்புகள் எவை?
- அ) காய்ச்சல், சொறியின்மை
- ஆ) காய்ச்சலுடன்சொறி
- இ) சொறி, காய்ச்சல் இல்லை [
-]
- ஈ) காய்ச்சல்அல்லதுசொறி
- 15) டெங்குகாய்ச்சலின் ஆரம்ப அறிகுறிகள் என்ன?
- அ) அதிகமான காய்ச்சல், மூட்டுவலி, தலைவலி

- ஆ) காய்ச்சல், வாந்தி, வயிற்றுப்போக்கு
- இ) காய்ச்சல், காஃவலி, வயிற்றுவிரிவு []
- ஈ) காய்ச்சல், க Z;வலி, அஜீரணம்
- 16) பின்வருவனவற்றில் டெங்குகாய்ச்சலின் அறிகுறிகள் எது?
 - அ) இருமும்போது இரத்தம்
 - ஆ) மனபிரம்மை
 - இ) அதிகமான காய்ச்சல் []
 - ஈ) அதிகமான மனஅழுத்தம்
- 17) டெங்குருதிபெருக்குகாய்ச்சலின் அறிகுறிகள் என்ன?
 - அ) மூக்கு, பற்கள், ஈறுகள்
மற்றும் தோலுக்கு அடியில் இரத்தபோக்கு
 - ஆ) குடல்புண்
 - இ) குறைந்த இரத்த அழுத்தம் []
 - ஈ) இரத்தசோகை
- 18) டெங்குகாய்ச்சலை உறுதி செய்யும் பரிசோதனை என்ன?
 - அ) சிறுநீர்பரிசோதனை ஆ) இரத்தபரிசோதனை
 - இ) சளிபரிசோதனை ஈ) மலபரிசோதனை []
-
- டெங்குகாய்ச்சலின் பின்விளைவுகள்
- 19) டெங்குகாய்ச்சலின் பின்விளைவுகள் என்ன?
 - அ) கல்லீரல் வீக்கம்
 - ஆ) மண்ணீரல் வீக்கம்
 - இ) வயிறுவீக்கம் []
 - ஈ) பித்தப்பை வீக்கம்
 -
- 20) டெங்குகாய்ச்சல் இரத்தப்போக்கு ஏற்படுவது எதனால்?

- அ) இரத்தத்தட்டுகளின் அளவுகுறைவதால்
- ஆ) திரும்பபாதிக்கப்படுவதால்
- இ) காரமான உணவை உண்பதால் [
-]
- ஈ) இரத்தவெள்ளை அணுக்கள் குறைவதால்
-
- **nlq;F Neha;j;Lg;G kw;Wk; rpfpr;ir Kiwfs;**
-
- 21) உங்கள் பகுதியில் டெங்குகாய்ச்சல் பாதிக்கப்பட்ட ஒருநபர் இருக்கும் போது நீங்கள் என்ன செய்ய வேண்டும்?
- அ) வீட்டிலேயே பாதிக்கப்பட்ட நபரை பாதுகாத்தல்
- ஆ) சுயமாகமருந்துஎடுக்கஆலோசனை கூறுதல்
- இ) தாமதமின்றி சுகாதார பணியாளரை அணுகுதல் [
-]
- ஈ) ஓய்வு எடுக்க ஆலோசனை கூறுதல்
-
- 22) டெங்கு காய்ச்சலை தடுப்பதற்கான நடவடிக்கை என்ன?
- அ) தொடர் மருத்துவ பரிசோதனை
- ஆ) ஆரோக்கியமான உணவுமுறை
- இ) ஏடிஸ் கொசு கடி மற்றும் கொசு உற்பத்தியை தடுத்தல் [
-]
- ஈ) தடுப்பூசி
-
-
-
-
-
- 23) நீங்கள் டெங்கு காய்ச்சல் பரவுவதை எப்படி தடுக்க முடியும்?
- அ) முகமூடி அணிவதன் மூலம்
- ஆ) மனித தொடர்பை துண்டிப்பதன் மூலம்

- இ) இருமும் போதும், தும்பும் போது வாயை மூடுதல் []
- ஈ) தேங்கி நிற்கும் தண்ணீரை அகற்றுதல்
-
- 24) ஏடிஸ் கொசுகடியிலிருந்து எவ்வாறு பாதுகாக்க வேண்டும்?
 - அ) கதவு, ஜன்னல்களை திறப்பதன் மூலம்
 - ஆ) வாய் மற்றும் மூக்கை மூடுவதன் மூலம்
 - இ) பருத்தி ஆடை அணிவதன் மூலம் []
 - ஈ) கொசுக்கடியினை தடுக்கும் மருந்து, சுருள், மற்றும் கொசுவலையை உபயோகிப்பதன் மூலம்
 -
- 25) ஒருவர் டெங்குவால் பாதிக்கப்பட்டிருக்கும் போது அதை
 - மற்றவர்களுக்கு பரவாமல் எவ்வாறு தடுக்கலாம்?
 - அ) ஏடிஸ்கொசுகடியிலிருந்து அந்தநபரை பாதுகாத்தல்
 - ஆ) மற்றவர்களுடனான தொடர்பை துண்டித்தல்
 - இ) தனி அறையில் வைத்தல் []
 - ஈ) தடுப்பு நடவடிக்கைகள் தேவை இல்லை
 -
- 26) டெங்குவால் பாதிக்கப்பட்டவருக்கு எந்த வகையான உணவினை
 - உட்கொள்ள வேண்டும்?
 - அ) மிதமான உணவு
 - ஆ) காரமான உணவு
 - இ) எப்போதும் உட்கொள்ளும் உணவுடன் அதிகமான வாய்வழி திரவம்
 - ஈ) சமச்சீர் உணவு []
 -

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-
-
- 27) டெங்கு காய்ச்சலால் பாதிக்கப்பட்டவரின் உடல்கூட்டை குறைக்க
 - நீங்கள் வீட்டில் என்ன செய்யலாம்?
 - அ) துணியால் சுற்றி வைத்தல்
 - ஆ) வாய்வழி திரவம் கொடுத்தல்
 - இ) தனிமைபடுத்தல் []
 - ஈ) பாராசிட்டமால் மாத்திரை மற்றும் குளிர்ந்த நீரில் ஓத்தடம்கொடுத்தல்
 -
- 28) கீழே கொடுக்கப்பட்டுள்ளவற்றில் எது தண்ணீரில் உள்ள கொசுப்புழுக்களை கொல்லப்பயன்படுகிறது?
 - அ) பாரிஸ்பச்சை மற்றும் அபேட்திரவம்
 - ஆ) குளோரின்
 - இ) சுண்ணாம்புதூள் []
 - ஈ) அயோடின்
 -
- 29) எங்கொல்லாம் தண்ணீர் தேங்க வாய்ப்பு இருக்கிறது?
 - அ) தேங்காய் ஓடு
 - ஆ) நிராகரிக்கப்பட்ட டயர்
 - இ) உடைந்தபானை மற்றும் பாட்டில்கள் []
 - ஈ) இவை அனைத்தும்
 -
- 30) வீட்டில் தண்ணீரை எவ்வாறு பாதுகாப்பாக சேமிக்கவேண்டும்?

- அ) தண்ணீரை மூடிவைத்தல்
- ஆ) தண்ணீரை திறந்துவைத்தல்
- இ) fpzw;Wj;jz;zPiug; gad;gLj;Jjy; []
- ஈ) Rj;jPfhp;fg;glhj jz;zPiug; gad;gLj;Jjy;
-

➤ fUtp – 3

➤ nlq;F fha;r;riy jLg:gjw;fhf gad;gLj;Jk; Kiwia Nfl;L

kw;Wk; ghh;j;J mstpLk; ml;ltiz

➤ Muha;r;rpahsh; nlq;F fha;r;rYf;fhd jLg;G
eltbf;iffis Neubahf kw;Wk; Neh;fhzy; Nfs;tpfsdp;

%oyk;இல்லத்தரசிகளின்; eltbf;iffis ghh;j;J bf; nra;thh;.

➤ gFjp –m: nlq;F fha;r;rypd; jLg;G Kiw
gw;wpa eltbf;iffis mwpa c;Tk; tiuaWf;fg;gl;l Neh;fhzy;
Nfs;tpfs;

| ➤ t | ➤ eltbf;if Nfs;tpfs; | ➤ M | ➤ , y ; i y |
|--------|--|--------|-------------------------|
| ➤ 1 | ➤ ePq;fs; jz;zPh; Nrfhpj;J itf;Fk; ghj;jpuj;ij Fiwe;jgl;rk; thuj;jpw;F xU KiwahtJ Rj;jk; nra;tPh;fsh? | ➤ | ➤ |
| ➤ 2 | ➤ ePq;fs; J}f;fp vwpag;gl;l lah;> Njq;fha; XL> cile;j ghl;by; kw;Wk; ghid> gpsh];bf; fth; kw;Wk; igfs;py; Njq;fpAs;s ePiu mfw;WtPh;fsh? | ➤ | ➤ |
| ➤ 3 | ➤ cq;fs; tPl;il Rw;wp ePh; Njq;fpAs;s Fopfis ePq;fs; Rj;jk; nra;tPh;fsh? | ➤ | ➤ |
| ➤ 4 | ➤ ePq;fs; g+r;nrz;L kw;Wk; Fsph;rhjdg; ngl;bapy; cs;s jz;zPiu Fiwe;jgl;rk; thuj;jpw;F xU KiwahtJ khw;WtPh;fsh? | ➤ | ➤ |
| ➤ 5 | ➤ ePq;fs; cuy; kw;Wk; nry;yg; gpuzpfSf;F gad;gLj;jg;gLk; ghj;jpuj;jpy; jz;zPh; ,y;yhky; itj;J nfhs;tPh;fsh? | ➤ | ➤ |
| ➤ | ➤ ePq;fs; cq;fs; jz;zPh; njhl;b;fis Fiwe;jgl;rk; | ➤ | ➤ |

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| 6 | %d;W khjj;jpw;F xU KiwahtJ Rj;jk; nra;tPh;fsh? | | |
| ➤ 7 | ➤ ePq;fs; nfhRtiy/nfhRth;j;jp RUs;/ nfhRth;j;jp jputk; gad;gLj;JfpwPh;fsh? | ➤ | ➤ |

➤

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| ➤ 8 | ➤ mt;tg;NghJ ePq;fs; / khefuhl;rpapy; nfhRf;fis mopf;f nfhRkUe;Jfis gad;gLj;JfpwPu;fsh? | ➤ | ➤ |
| ➤ 9 | ➤ ePq;fs %ba ghj;jpuj;jpy; jz;zPh; Nrkpj;J; nfhs;tPh;fsh? | ➤ | ➤ |
| ➤ 1 | ➤ cq;fs; tPl;ilr; Rw;wpnfhR tsu;tjw;F tha;g;Gs;s ,lk; ,y;iyjhdh? | ➤ | ➤ |
| ➤ 1 | ➤ ePq;fs; Fg;igfis rupahd Kiwapy; mfw;WfpwPu;fsh? | ➤ | ➤ |
| ➤ 1 | ➤ ePq;fs; fopTePiu %ba my;yJ Njhl;l;j;jpd; topahf ntspNaw;WfpwPu;fsh? | ➤ | ➤ |
| ➤ 1 | ➤ ePq;fs; tPl;ilr; Rw;wp Rj;jkhf itj;J ,Uf;fpwPu;fsh? | ➤ | ➤ |

➤

➤ **gFjp –M: nlq;F fha;r;rypd; jLg;G Kiw gw;wpa
eltbf;iffis ghj;j;J mstpLk; ml;ltiz**

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| ➤ t | ➤ ghh;j;J mstpLk; eltbf;if ml;ltiz | ➤ M | ➤ . y : i y |
| ➤ | ➤ Rw;Wg;Gwr;Rj;jk; gw;wpa eltbf;iffs; | ➤ | ➤ |

| | | | |
|--------|--|---|---|
| ➤ 1 | ➤ Rw;Wg;Gwq;fspy; jz;zPu; Njf;fk; ,y;iy | ➤ | ➤ |
| ➤ 1 | ➤ gioa gad;gLj;jg;gl;l lah;fspy Njq;fha; XLfspy;; cile;j ghl;by;fs; kw;Wk; ghidfspy; J}f;fpnawpag;gl;l gpsh];bf; fth;fs;> lk;su; kw;Wk; igfspy G+r;n rz;by jz;zPu; Njf;fk; ,y;iy | ➤ | ➤ |
| ➤ 1 | ➤ cuypy; jz;zPh; Njq;fp ,y;iy | ➤ | ➤ |
| ➤ 1 | ➤ %ba ghj;jpuj;jpy; jz;zPh; Nrkpj;J itf;fg;gl;Ls;sJ. | ➤ | ➤ |
| ➤ 1 | ➤ jz;zPh; Nrkpj;J itf;fg;gl;l njhl;b %b itf;fg;gl;L cs;sJ. | ➤ | ➤ |
| ➤ 1 | ➤ Nrkpj;J itj;Js;s jz;zPupy; nfhRg;GO f;fs; ,y;iy. | ➤ | ➤ |
| ➤ 2 | ➤ tPl;L rd;dy;fSf;F nfhRtiy mikf;fg;gl;Ls;sJ. | ➤ | ➤ |

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➤ ANNEXURE – IX

➤ İşyınjuÁfS;fhd blŞF fhCErş jLıF« KiwfY g%ooĖ ÂfläfLL totik;fYgfl fšeaĖL.

- bga® : **bg. bfsrřah**
- jiyYò : blŞF fhCErş jLYò k%oW«
fFLYghfLL
- KiwfY
- İl« : XyYghisa«
- neu« : 45 äälşfY

- f%oŦ;F« bkhê : jăœ
- f%oŦ;F« Kiw : fy^aJiuahLjš
- gŦF bgWnth@ : ĨşyŕjuÁfŸ
- gŦF bgWnth@fê v©â;if: 50
- f%oŦŕY;fhd cgfuzŦfŸ : gl;fhŒÁfŸ
- **bgh.Jthd neh;f«**
- Ĩ^aj gačŦÁæ« Koés, ĨşyŕjuÁfŸ blŦF fhŒŦriy jLŸò k%oW«
fŒLŸghŒL KiwfŸ g%oç mç^aJ bfh©L, Ŧ« mjid jL;f nk%obfhŸS« elto;iffis j«
ŦŒoY« k%oW« R%oWŸòwŕŦY« Ŧw«gl
braŦ gLŕJth@fŸ.
- **FçYŦŦl neh;f«**
- tFŸŦ« Koés ĨşyŕjuÁfŸ mçtJ.
- blŦF fhŒŦrè« bghUŸ
- VO° bfhRé« ÁwŸghd Fz ey«fŸ
- blŦF fhŒŦrY;fhd fhuzŦfŸ
- blŦF fhŒŦrŦ guĬ« Kiw
- VO° bfhRé« thœ;if RH%oÁ Kiw
- blŦF fhŒŦrè« nehĬŦ@fhy«
- blŦF fhŒŦrY;fhd mçFçfŸ
- blŦF fhŒŦriy f©lçĬ« gçnrhjid KiwfŸ
- blŦF fhŒŦrŦ tuhks k%oW« t^aj Ŧ«ò fŒLŸgLŕJ« elto;iffŸ
- blŦF fhŒŦrè« Ŧ« éisĬfŸ.

| ➤ neu « | ➤ FĕYĂĖ l neh;f« | ➤ bghUsl;f« | ➤ f %oĂaj è< neh;f« | ➤ f %oĂajY;fh d cgfuzšfY | ➤ kĂY ÔL brĖ jš |
|------------|-----------------------------------|---|------------------------------|-----------------------------------|--|
| ➤ | ➤ İşyɑjuÁf Y̆ tiuaiu étçɑjš | ➤ <u>K<Diu</u> ➤ blşF fhĖċrş bfhR;fē< _y« guĭ« xU itu° bjh%W nehahF«. İJ btYg k%W« äjbtYg ehLfēš, efu« k %W« òw efuşfēš tÁ;F« k;fis jh;F« K;»a kW njh<ġ nehahF«. İªnehĖ rŪg fhykhf e« ehŁoš V %ogŁLŸs éiuthd ef@òwkakh;Fjš, thæ;if Kiw kh %ow« k%W« j©Ū® nkyh©ik g%owh;Fiw ngh<w fhuzşfshş mÂfkhf guĭ»wJ. »uhkYòwşfēšk%W_ efuşfēš k;fY̆ Ā<g%ow; Toa Kiwa%ow j©Ū® nräªJ it;F_ gH;fşfshş blşF fhĖċriy guYò« bfhRé< tĂYĂlşfY̆ mÂfç;»wJ. ➤ ➤ <u>blşF fhĖċrè< tiuaiw</u> ➤ blşF fhĖċrş v<gJ blşF itu[hş c©lhf Toa xU itu° nehĖ. İªnehĖ VO° vdYgL«. bfhRé< _y« kâj@fS;F guĭ»wJ. İJnt blşF fhĖċrş vdYgL«. ➤ ➤ | ➤ tiuaiwia f%owş | ➤ gl;fhŁÁ | ➤ ➤ ➤ ➤ ➤ ➤ blşF fhĖ ċrş v<whş v<d? ➤ ➤ ➤ ➤ |
| ➤ | ➤ ➤ ➤ ➤ | ➤ İªnehĖ;F İj%F vY«ò KĉÎ fhĖċrş v<w k %obwhU bgaU« c©L. Vbd<whş İ;fhĖċryhş ghÂ;fYgŁt®fS;F mÂf fhĖċrş, mÂf jiytè, | ➤ ➤ ➤ ➤ | ➤ ➤ ➤ ➤ | ➤ ➤ ➤ ➤ |

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|--|---|--|---------|---|---|
| | ➤ | ➤ M®ngh itu° v<D« tífia¢ rh®ªj iturhš ĩªneh¢ | fhuâfis | ➤ | ➤ |
| | ➤ | c©lh»wJ. ĩªj ituÁš nkY« eh<F Jiz tiffŸ cŸsd. | f%oÃªjš | ➤ | ➤ |
| | ➤ | mit tif 1, 2, 3 k%oW« 4 v<W tifŸgLªjŸgLŸsd. | ➤ | ➤ | ➤ |
| | ➤ | ĩªj neh¢ VO° v<D« tífia¢ rh®ªj bfhRé< _y« | ➤ | ➤ | ➤ |
| | ➤ | guĴ»wJ. | ➤ | ➤ | ➤ |
| | ➤ | ➤ | ➤ | ➤ | ➤ |
| | ➤ | ➤ <u>taJ</u> | ➤ | ➤ | ➤ |
| | ➤ | ➤ blšF fh¢¢rš midªJ taÂdiuí« jh;F« F¿Ÿghf neha | ➤ | ➤ | ➤ |
| | ➤ | vÂ®Ÿò r;Â Fiwthf cŸs 15 taÂ%oF c£g£l | ➤ | ➤ | ➤ |
| | ➤ | FHªijfis k£Lnk mÂfkhf ghÂ;»wJ k%oW« | ➤ | ➤ | ➤ |
| | ➤ | KÂnah®fisÍ« ghÂ;»wJ. | ➤ | ➤ | ➤ |
| | ➤ | ➤ | ➤ | ➤ | ➤ |
| | ➤ | ➤ <u>ghèd«</u> | ➤ | ➤ | ➤ |
| | ➤ | ➤ blšF fh¢¢rš M©, bg© ĩUghyiuÍ« ghÂ;»wJ. | ➤ | ➤ | ➤ |
| | ➤ | ➤ | ➤ | ➤ | ➤ |
| | ➤ | ➤ <u>vÂ®Ÿò r;Â</u> | ➤ | ➤ | ➤ |
| | ➤ | ➤ ĩJ neh¢ vÂ®Ÿò r;Â Fiwthf cŸs kâj®fis | ➤ | ➤ | ➤ |
| | ➤ | ghÂ;»wJ. | ➤ | ➤ | ➤ |
| | ➤ | ➤ | ➤ | ➤ | ➤ |
| | ➤ | ➤ <u>R%oWow Nœâiy</u> | ➤ | ➤ | ➤ |
| | ➤ | ➤ <u>gUtfhy«</u> | ➤ | ➤ | ➤ |

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|--|--|---|---|----------------------------|---|
| | <p>bfhRé< thœ;if¢ RH %oÁia étçºjš</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤ ĩšyºjuÁf Ÿ blšF fh¢¢rèš neh¢ mU«ò fhy« étçºjš</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> | <p>➤</p> <p>➤ <u>guĬ« RH%oÁ Kiw:-</u></p> <p>➤ VO° bfhR ghÂ;fŸgŁl egıu foºJ ĩuºjıij cŁŠR« nghJ blšF itu° bfhRé< clèDŸ brš»wJ. ĂwF ĩ;bfhR Mnuhı»akhd k%obwhUtıu foıF« nghJ ĩı»Uäia mtç< clèš brYºÂ nehĬ©lhı»wJ. Ĭ«Kiwæš jhd VO° bfhR xUtçläUªJ k %obwhUtUıF nehıŸ guŸò»wJ.</p> <p>➤ ghÂ;fŸgŁl eg® - bfhR - Mnuhı»akhd eg®.</p> <p>➤ <u>VO° bfhRé< thœ;if¢ RH%oÁ</u></p> <p>➤ VO° bfhR Rºjkhd j©Ùçš KŁilæL»wJ. Ă<d® 2-3 ehŁfSıF ĂwF KŁilŸòGthf cUth» Ă<d® TŁLŸòGthf cUth»wJ. ĂwF KÂ®¢Á milªj bg© bfhRthf khW»wJ. ĩ;bfhRé< KŁil Rkh® 7-10 ehŁfSıF ĂwF KG ts®¢Á milªj bfhRthf khWtjhš thuºÂ%oF xU KiwahtJ nrªJ itºJŸs j©Ùıu mf%ow nt©L«.</p> <p>➤</p> <p>➤ <u>neh¢ mU«òfhy«</u></p> <p>➤ neh¢ mU«ò fhy« v<gJ xU neh¢»Uä clèDŸ</p> | <p>➤ VO° bfhRé< thœ;if¢ RH %oÁia f %oĂºjš</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤ blšF fh¢ ¢rèš neh mU«ò fhyıij f %owš</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> <p>➤</p> | <p>➤</p> <p>➤</p> <p>➤</p> | <p>➤ VO° bfhRé < thœ;if ¢ RH %oÁ v<d?</p> |
|--|--|---|---|----------------------------|---|

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|---|---|--|--|-----------|--|
| | | <p>br<W mJ Kjš mčFč V%ogLaj vLaj; bfhŸS« fhy« MF«.</p> <p>➤ blšF fhCEčrè< nehCE mU«òfhy«.</p> <p>➤ 2-7 ehŁfŸ MF«.</p> <p>➤ <u>blšF fhačrè< mčFčfŸ</u></p> <p>➤ blšF fhCEčrè< mčFčfis Ā<tUkhW fhzyh«.</p> <ul style="list-style-type: none"> • ĀObud FēUl< Toa mĀfkhd fhCEčrš • fLikahd jiytç k%W« KJFtè • bjh©il tè • tæ%W tè • njhš mçŸò k%W« Ātąjš • clš gyĀd« • gĀæ<ik • ĀiF, gš, <W k%W« njhYiF Ñœ İuąji fĀĬ V %ogLjš • thæ< nk%ogFĀæš ĀtŸò āw bfhŸgsšfŸ njh<Wjš • İuąjç jĒL;fè< v©â;if Fiwjš • if, fhš, éWąJŸ nghjš • gyĀdkhd ehoąJoŸò • Fiw^aj İuąj mGąj« V%ogLjš | | | |
| ➤ | <p>➤ İšyąjuĀf Ÿ blšF fhCEčriy f©lčĬ« gçnrhjíd ➤ ia étçąjš</p> | <p>➤ <u>blšF fhCEčriy f©lčĬ« gçnrhjíd.</u></p> <p>➤ İuąjŸ gçnrhjídæ< Āy« blšF fhCEčriy f©lčĬa KoĬ« mit v<dbt<whš,</p> <p>➤ İuąjçjĒLfŸ.</p> <p>➤ rhjhuzkhf İuąjç jĒLfŸ 2 yĒr« Kjš 2.5 yčr« ä.Ū.3 v<w mséš İUjF«. MdhsĬj< v©â;if 1 yĒr« ä.Ū.3jF</p> | ➤ blšF fhCE čriy f©lčĬ« gçnrhji dia f | ➤ gl;fhĒĀ | ➤ blšF fhCEai y f©lčĬ « gçnrh |

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|---|---|---|--------|---|--------------------|
| | | <p>Fiwthf blšF fhĖĖrèš fhzŸgL»wJ. İit İuaj; fÁÎV %oglhkš jLŸgiy .mt%oı< vĖâ;ıf FiwÍ« nghJ clèš İuaj; fÁÎ V%ogL»wJ. bAkEnl»çf msÎ« 20 rjé»j« mšyJ mj%oF nkš ca®»wJ.</p> <ul style="list-style-type: none"> ➤ İuaj btŸis mQ;fŸ. ➤ rhjhuzkhf İuaj btŸis mQ;fë< vĖâ;ıf 4000 – 10000 br.Ū. v<W fhzŸgL»wJ. ➤ İj< vĖâ;ıf blšF fhĖEaĖrèš Fiw»wJ. vđnt nehĖ vÂ®Ÿò r;ÂÎ« Fiw»wJ. ➤ <u>blšF fhĖĖrè< Â< éisİfŸ</u> <ul style="list-style-type: none"> • fšÂuš Â;f« • mÂf İuaj;fÁÎ • clš mÂ®ĖÁ • #<å • clèš Ú®ĖrªJ Fiwjš • Fiwªj İuaj mGªj« | %oÂªjš | | jid v<bd< d? |
| ➤ | ➤ İšyjuÁf Ÿ blšF ;hĖĖrè< Â>Ėir Kiwfis étçªjš | <ul style="list-style-type: none"> ➤ <u>blšF fhĖĖrè< Â>Ėir KiwfŸ.</u> <ul style="list-style-type: none"> • blšF fhĖĖrY;F mçFçfŸ r«kªjŸgfl Â>Ėir Kiwfns cŸsd. • nehahš ghÂ;fŸgfl® nghJkhd XĖÎ vLªJ; bfhŸs ntĖL«. • ghÂ;fŸgfltiu ja miwæš it;f ntĖL«.bfhR fo;fhkš İU;f bfhR tiyia ga<gLªJtj< _y« nehĖ guİtij jL;fyh«. • blšF jhĖÁajhš clèš Ú® İHŸò V%oglhkš İU;f MušR gHĖrhW, İsÚ®, cŸðfiurš, fšÁ ngh<wt %oiw bfhL;f ntĖL« • Fë®ªj Úçš xªjl« bfhLªjhš fhĖĖriy fflŸgLªjyh«. nkY« ghuhÁflkhš khªÂiufis cfl | ➤ | ➤ | ➤ |

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|---|---|--|---|---|---|
| | | <p>bfhŸs nt©L«.</p> <ul style="list-style-type: none"> • ĩuaj; fÁÎ V%ogLtj%ofhd m¿F¿fŸ bj<£lhš clnd kU²Jt kid;F bršy nt©L«. • ĩuaj; fÁÎ V%og£lhš, ĩuaj« clèDŸ c£ brY²j nt©L«. • m>tŸnghJ gçnrhjíd brCEJ m¿F¿ fS;F V%owh %onghš Á»£ir vL²J; bfhŸs nt©L« • blšF fhCE£rY;fhd Á»£irfŸ Mu«g Rfhjhu ãiya« k%oW« mur kU²Jt kidfěš mē;fŸgL»wJ. <p>➤</p> | | | |
| ➤ | <p>➤</p> <p>➤</p> <p>➤</p> <p>➤ ĩšy²juÁf Ÿ blšF fhCEriy jL;F« KiwfŸ g %o ¿ étç²jš</p> | <p>➤ <u>blšF fhCEriy jL;F« KiwfŸ.</u></p> <p>➤ blšF fhCE£rY;F jLŸ6Á VJäšiy.vdnt ĩªnehCE guŸò« bfhr;fŸ c%og²Á MfhjthW gh²²J; bfhŸs nt©L«.k%oW« m;bfhR fo;fhkš gh²²J; bfhŸs nt©L«. ĩu©L KiwfěY« jLŸò Kiwfis ifahs nt©L«. mt%oiw Ä< tUkhW gh²Ÿngh«.</p> <p>➤</p> <p>➤ VO° bfhR c%og²Áia jL;F« KiwfŸ</p> <ul style="list-style-type: none"> • R%oWŸ òw²Áš kiH Ú® njšfhkš R²jkhf it²J; bfhŸs nt©L«. bfhR;fŸ c%og²Á MfhjthW.Á£likŸgfŸ ĩU;f nt©L«. <p>➤</p> <ul style="list-style-type: none"> • Å£il£ R%o¿ĬŸs giHa la®fŸ, njšfhCE XLfŸ, cilª ghidfŸ, gh£ošfŸ, fhè lŸgh;fŸ, Åsh°o; fŸ, k %oW« igfŸ ngh<w njita%ow bghU£fis mŸòwŸ gL²Á Ú® njšfhjthW gh²²J;bfhŸs nt©L«. • M£L;fšěš j©Ú® njšfhkš gh²²J; bfhŸs nt©L«. k%oW« ga<gl²jŸglhj M£L;fšiy jiyÑHhf féœ²J mšyJ k© ngh£L _o it;f nt©L«. | ➤ | ➤ | ➤ |

| | | | | | |
|---|---|--|---|---|---|
| | | <ul style="list-style-type: none"> • j©Ù® nräJ it;F« ghÂuðfis _o it;f nt©L«. • Fç® rhjd¥ bg£o k%oW« Fë%£oæš cŸs j©Ùiu mf%ow nt©L«. • ó #hoæš cŸs j©Ùiu m<whl« kh%ow nt©L«. • Å£il R%oçÍŸs njita%ow¥bghU£fŸ, òš k%oW« òj®fis mf%ow nt©L«. • thuÂ%F xU KiwahtJ Ú®äiyð bjh£ofëš efu gâahs®fŸ mng£ fiuriy j©Ùçš fy;F»wh®fsh v<W ftâ;f nt©L«. | | | |
| ➤ | ➤ | <p>➤ VO° bfhR;foia jL;F« KiwfŸ</p> <ul style="list-style-type: none"> • _ëif FzKŸs nr«ò k%oW« JsÁ ïitfis ga<gL°Â Å£L;FŸ k%oW« Å£il R%oç òif nghlyh«. • bfhRt®Â RUŸ, ä<rhupjhš Méah;fi Toa nk£LfŸ ngh<wt%oiw ga<gL°Â bfhR;foia jL;fyh«. nkY« bfhR;fo kUªÂid clè< ghfšfëš jlél« bfhR; foia jL;fyh«. • #<dš k%oW« fjÎfis mÂfhiyæY« k%oW« khiyæY« _o it;f nt©L«. • #<dšfŸ k%oW« fjÎfS;F bfhRtiyia ga<gL°j nt©L«. • Áça bfhRit° Â©Q« Êid ga<gL°ÂÍ« bfhRit xê;f KoÍ«. • gL;jifia jiuæèUªJ _<W mo cauÂ%F mikªJ; bfhŸsÎ«. <p>➤</p> <ul style="list-style-type: none"> • bfhRtiyia ga<gLjÂ bfhR Å£oDŸ EiHti; jL;f nt©L«. • Å£o< R%oW¥òw gFÂfis R°jkhfÎk, RfhjhukhfÎ« itªJ; bfhŸs nt©L«. | ➤ | ➤ | ➤ |

| | | | | | |
|---|---|--|---|---|---|
| | | <ul style="list-style-type: none"> • gLjifiaŕ R%ŕ bfhRtiy mik;jf nt©L«. | | | |
| ➤ | ➤ | <ul style="list-style-type: none"> ➤ ➤ <u>bjhFYòiu</u> ➤ ĪJtiu blšF fhŒŒriyŸ g%ŕ Ā<tU« jiyŸòfěš gh®ŕnjh«. mjhtJ blšF fhŒŒrè< tiuaiw fhuzšfŸ, guĪ« Kiw, bfhRé< thœ;jfŒ RH%ŕÁ, m;F;fŸ, guhkç;F« KiwfŸ, fŁŁgŁŕJ« k%ŦW« jLŸò elto;jffŸ g%ŕ gh®ŕnjh«. ➤ ➤ ➤ ➤ ➤ <u>Koliu</u> ➤ blšF fhŒŒrš bfhRédhš guĪ« xU itu° nehŒ. vdnť Cçš cŸs midťU« x<whf ĪizªJ bfhR c%ŕgŕĀ;F VJthf cŸs R%ŦWŸ òwŕij mf%Ŧw xŕJiH;jf nt©L«. k%ŦW« VO° bfhR;foia jL;jf bfhRt®ŕĀ rhjdšfis gfěš ga<gŁŕj nt©L«. nehŒ;jF Á»Œir mēŸgij él tuhkš jLŸgJ ÁwªJ. ➤ | ➤ | ➤ | ➤ |

➤

➤

➤



➤ ANNEXURE – X





➤ ANNEXURE – XI



➤ **rk;ke;jg;gbtk;**



➤[~].!!

➤ ,g;gbf;F>



➤ **(3012274**

51)



➤ nlq;F fha;r;ry; gw;wpa jfty;fs; kw;Wk; mjd; jLg;G
Kiwfs; gw;wpa Rfhjhu eyf;fy;tp gw;wp **(301227451)** fw;Wj;ju
cs;shh;. vdNt mtuJ Muha;;r;rpapy; gq;fhsuhf ,Ue;J cjtp nra;a
KOkdJld; rk;kjpf;fpNwd;.



➤ ,g;gbf;F>



➤ gq;Nfw;ghsh;

